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MINNESOTA MEDICINE

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VOL. VI DECEMBER, 1923 No. 12

ORIGINAL ARTICLES

THE DIAGNOSIS OF CHRONIC CHOLECYSTITIS*

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Since to the surgeon disease of the biliary tract and gallbladder represents the most frequent chronic intra-abdominal infection with which he has to deal and by the internist and gastro-enterologist is recognized as the second great cause of chronic indigestion, it would appear fitting and profitable to discuss jointly the problem of differential diagnosis. For while the classical gallbladder, as seen by the surgeon in the patient who has been urged by his family physician, after years of observation, to be operated for gallstones, is scarcely to be regarded as a problem in diagnosis, we are just beginning to appreciate the necessity for earlier intervention and hence must be prepared to differentiate these cases at least a decade earlier than we are doing. Besides there are atypical types, so-called "silent cases" and complicated situations—all too many—met in the medical division, of which the surgeon sees or hears little and therefore, only too frequently, unaided, fails to unravel.

To appreciate the problem, it is necessary at the onset to be reminded of the fact that the gallbladder is only a unit in a definite digestive complex, embracing the liver, gallbladder, pancreas and stomach, and any disease affecting one unit is bound to be reflected in the whole system. While mere contiguity of these organs is of importance, a working knowledge of the circulation and nerve supply of these parts is of vital importance in differential diagnostic study and particularly would I draw your attention to the knowledge gained by the work of Westphal[4] on the vegetative nervous system in relation to the biliary apparatus and the need of a full appreciation of its bearing on the problem under discussion.

The territory drained by the portal vein extends from the stomach to upper rectum. This is probably the most common route of infection via the liver, through the final lymphatics to the biliary tract and gallbladder. The lymph vessels of the gallbladder pass in a main downward in the gastro-hepatic omentum in close relation to the common duct behind the first part of the duodenum, to be embedded in the posterior surface of the head of the pancreas, here inosculating freely with lymph vessels of the duodenum and pancreas. Inflammatory occlusion leads to duodenal and pancreatic retrograde-transport infection. In conditions of bacteremia, the infectious agent, frequently a streptococcus or pneumococcus, is conveyed to the liver by the hepatic artery and thence via the lymphatics to the biliary tract and gallbladder.

The nerve supply is derived from both vagi and from the fifth to tenth thoracic nerves via the splanchnics. That part derived from the ninth right intercostal segment is the sensory nerve to the gallbladder, distributed to the cystic duct area (an attack of acute cholecystitis has been recorded as immediately preceding herpes zoster, affecting the skin area supplied by this nerve).

With this all too brief background, it is best now to go back and reconstruct the life history of chronic gallbladder disease and this is most profitably done by decades.

During the first and second decades, the development of cholecystitis is not infrequently noted in carefully taken case histories. Frequently, a severe angina, typhoid fever, pneumonia or acute appendicitis has preceded the onset by a few weeks or months. Then there develop:

1. *Toxemic Symptoms.*—Periodic headaches, attended or not by nausea and followed by several days of food repugnance — often very migraine-like.

*Presented in symposium on Diseases of the Gallbladder before annual meeting of Minnesota State Medical Association, St. Paul, October, 1923.

2. *Reflex Digestive Symptoms.*—Fullness, belching, sour eructations, foul taste, qualitative dyspepsia. There is rarely vomiting and the dyspepsia varies from week to week with short exacerbations, but at this stage rarely causing the patient to seek a physician and yet at no time having a long period of entire freedom such as the duodenal ulcer patient has. So-called intestinal indigestion with flatulence is often a prominent part of the picture in this stage. A reflex asthma has been seen by myself at this stage.

The important fact to bear in mind is that at this time in the cycle of development there are no localizing signs and yet the gallbladder and its lymphatic structure, so important in its function of absorption, is being seriously compromised.

During the third and fourth decades and approximately seven times as frequently in the multiparous female, the evolution will gather force until—

1. Indigestion leads to vomiting without definite relief and belching for relief becomes more pronounced and continuous—the early hyperchlorhydria is now going over into a hypochlorhydria. At this stage hot water is often resorted to by the patient with a good deal of relief—not soda.

2. Biliary ache. The patient now complains of a dull aching sensation in the right hypochondrium radiating posteriorly in the path of the ninth right intercostal.

3. This ache mounts until a gradual attack of pain develops under the right rib region, attended by chilliness and mild or moderate fever, distention but little if any vomiting, lasting from one-half to two or three days—at no time requiring a hypodermic for relief. Since this is an acute lymphangitis of the gallbladder and proximal duct region, a leucocytosis is present. When the lymphatics of the pancreas and duodenum are implicated, the pain across the upper lumbar region is more pronounced and vomiting, with loose, fat-containing stools, frequently occurs.

4. The culminating phenomenon—a cholelithiasis attack—occurs when a pre-existing stone migrates, or attempts to do so, as a result of reflex or inflammatory hyperperistalsis. The immediate cause will be one or a combination of the following: (a) *Mechanical*—Jolting, particularly a rough automobile ride, walking down grade or downstairs and work involving stooping. (b) *Psychic*—A fit of anger. (c) *Menstrual*—And certain cycles in the gravid state. (d) *Dietetic*—High fat diet, especially mayonnaise dressing.

This feature is of dramatic suddenness in onset, attended by reflex vomiting, usually repeated without relief from the pain, for which an opiate is required. While the pain is located at the ninth right costal margin, it is referred to the scapula or right shoulder or as high as the right supreclavicular fossa. Often it is referred to the ensiform region and occasionally, when very much gastric distention is present, to the left scapula. Following the attack, which may cease very suddenly, there is a general abdominal soreness, but maximum at the ninth costal margin with a pronounced rigidity of the upper right rectus. Since jaundice is present in but 17 per cent of all cases seen in general practice, its absence following the colic attack is not, of course, of differential moment at this stage.

It is during the fourth to the eighth decade now that advancing local changes and complications can be expected. Time forbids more than an enumeration of these distinctly surgical calamities: (1) empyema of the gallbladder; (2) gangrene; (3) obstruction of the common duct; (4) pancreatitis; (5) rupture or perforation; (6) acute peritonitis; (7) intestinal stone obstruction; (8) malignant disease.

Having pictured the behavior of the more or less true-to-type gallbladder from its incipiency to its advanced stage and having thereby become impressed with the fact that a proper appreciation of the time and sequence element is all-important, it is next in order to discuss the diseases and complexes which are most likely to be confused with cholecystitis and ways and means of differential diagnosis.

The most difficult everyday differentiation undoubtedly is furnished by diseases of the duodenum and appendix. In the former, we have contiguity, contact, associated nerve and lymph supply, as well as close physiologic relationship, together making differentiation at times a fine art and indeed there is all too frequently pathology in both organs.

A proper history relative to antecedent illnesses; a careful, indirectly arrived at story of the exact digestive symptoms (their relation to food, soda and exertion, their periodicity, etc.); the presence of colic (its radiation and its severity as measured by drugs required for relief) may frequently yield a presumptive diagnosis.

Physical examination—that part having directly to do with the localizing phenomena, is confined for all practical purposes to palpation, and there it has often been profitable to me to look for tender pressure points along the course of the ninth right intercostal nerve in the back and the phrenic reflex on the right side, for this tender point in the neck is present three times as often as a history of pain radiating to this area and hyperesthesia with tenderness on pressure not only is often a forerunner of a biliary colic attack, but lasts for many days after an attack. Murphy's sign is often entirely absent in the early gallbladder, which when present is of real value only in the slender individual with a duodenum not so intimately associated as these two organs generally are in the sthenic and hypersthenic type. When a definitely fixed pain point can be elicited at or near the umbilicus and the edge of the liver can be palpated during quiet respiration just under the costal margin, then it becomes possible to differentiate, with some confidence, between duodenal ulcer and the tenderness of an infected gallbladder. Rigidity is marked during an acute cholecystitis or cholelithiasis attack, but for differentiation, the most favorable time is during the defervescence of an attack. In the interim, there is in the majority of cases in the third, fourth and fifth decades, no hint of the well established pathology lying within.

Since the abdomen hides so well, it becomes necessary oft to turn to the laboratory for help in an obscure case. Secretory gastric studies yield little that is definite. Achlorhydria is present in from 40 to 50 per cent of chronic gallbladder cases, but is to be used with reservation as a differential point, for age and edentia are factors, and of course a lesser percentage of duodenal ulcers are accompanied by hypo- or achlorhydria. On the other hand, the roentgen contribution is indispensable, for, with good technique, in from 15 to 20 per cent of cases in which stones are found at operation, they can be directly demonstrated on the film. More important still, in 85 per cent indirect signs are found, which is a very respectable contribution to gallbladder diagnosis.

Based upon the erroneous assumption that the gallbladder is a storage organ and can be drained like the urinary bladder via duodenal siphonage, Lyon offered a solution of our differential difficulties in the so-called Lyon-Meltzer test. Ten years ago, when first occupied with bile drainage studies, I convinced myself that the method had no future in the diagnosis of chronic cholecystitis. Fitz and Aldrich,[3] within the year, working with a large material, have properly dismissed the procedure as of no differential value. Bernhard and Maue's[1] modification of Meulengracht's test for bile in the blood is of value for there is a wide margin between the normal bile values found in the blood and bile in the urine, for bile is a threshold substance.

In a suspected difficult case, in the absence of clinical jaundice and of bile in the urine, a restudy may be undertaken with profit when the blood bile values are higher than normal.

While the cholesterol problem has a bearing on the etiology of gallbladder disease quite apart from infection, as has been very well advanced lately by Boyd,[2] cholesterol determinations in the blood have yielded no practical help in diagnosis.

The roentgen ray helps materially in differentiating duodenal ulcer, by direct evidence, from gallbladder disease, but this is not true of the chronic, recurring type of appendicitis. Here a good history, the palpatory findings during or near a supposed attack, a leucocyte count and an absence of the proper etiological factors for gallbladder disease must be relied upon, not forgetting the frequent association, as well as the etioloigcal relationship between appendicitis and cholecystitis.

Perforation of a gastric or duodenal ulcer is attended by such violent symptoms of prostration and such marked and extensive reflex rigidity generally over the whole of the abdomen, that it needs to be considered only in differentiation from the complications of cholecystitis.

In renal colic, the reflex rigidity is in the lumbar muscles (although the abdomen may be very much distended) and the radiation of the pain is caudally. However, right hydronephrosis, large enough to present under the right liver edge, may be confused with gallbladder disease unless bimanual palpation is done routinely as it should be in every right hypochondriac region enlargement. Hernia of the epigastrium and umbilicus is always to be ruled out with care when lifting and reaching movements precipitate the colic attacks with regularity.

Gastric crises of tabes are readily confused with biliary colic, but with an adequate neurological study, there should be no difficulty. Occasionally,

stones producing no symptoms are present in a patient suffering with gastric crises of tabes, and operative interference is undertaken with no credit to all concerned, as I well remember in one personal case.

Not infrequently migraine, particularly when it takes on the gastric form, is difficult of differentiation from gallbladder disease. Here again a thorough familial history is of the greatest help; also the therapeutic test of luminal.

In women, usually of the fleshy type, in the fourth and fifth decades, there occurs what I have taken to be a spasm of the proximal colon ring where the physiologic cecum ends and the colon proper begins. These patients have a flatulent disturbance of the colon and will at intervals develop attacks of colic with vomiting spells and a temperature as high as 104, with a very marked tenderness and mild rigidity at the junction of the first with the middle third of the transverse colon. The attacks are followed by marked sallowness, and in the presence of a low-lying liver the problem is often one of observation and repeated roentgen ray studies. A number of these patients, in my period of observation of ten years, have not developed cholecystitis.

Diverticulitis of the colon is occasionally difficult to differentiate from gallbladder disease, but the localizing signs are far removed and the pain is referred caudally in the former.

In splanchnoptosis with acquired membranes extending from the colon along the omentum to the under surface of the gallbladder and across the duodenum, we have frequently a syndrome simulating gallbladder disease. These are to be differentiated by: (1) the constant inconstancy of the pain —no free intervals like the gallbladder; (2) relief by lying down; (3) the presence of defective fixation of the cecum and ascending colon, as determined by palpation, particularly under the fluoroscope.

A calamity that can be avoided by a lively appreciation of relation of the colic to exertion is that of doing a cholecystectomy on an elderly patient affected with angina pectoris. This can readily happen when "silent stones" are found by roentgen ray and the agonal attacks radiate to the ensiform and not to the left shoulder and arm. There is probably more excuse for mistaking angina of the celiac vessels in an elderly patient for biliary colic, but here again the relation of pain to the exertion and the influence of rest should be read aright.

While the foregoing discussion is aimed at differentiating the more or less classical gallbladder from lesions of other causation, it remains to merely mention that atypical forms exist, of which a few are the following:

1. *The Silent Gallbladder:* With no antecedent toxic or reflex digestive disturbance ushered in by a very agonizing colic attack following which dyspeptic conditions first develop.

2. *The Febrile Gallbladder:* No localizing signs or symptoms, no dyspeptic symptoms, but a daily temperature running a curve very much like a phthisical patient. I have seen one such in a young female patient who spent a half year in a sanitarium. The gallbladder in this case was very large, thin-walled and adherent for 10 cm. to the duodenum and its removal led to immediate restoration to health.

3. *The Neurological Gallbladder:* A type seen in middle-aged individuals with no complaint referred to the abdomen, but a multitude of so-called nervous symptoms, parasthesias and anxieties and often marked complaint with reference to head pain, in whom a routine gastro-intestinal study brings forth the surprising evidence of a rather advanced biliary disease and in whom surgery cures and relieves the neurologist of a vast burden.

4. *The Hypercholesteremic Gallbladder:* It is not infrequent (I have seen four such cases) that the surgeon will remove the gallbladder and the stones contained therein, in a patient ill with pernicious anemia, mistaking the icterus for obstructive jaundice, and then call in consultation because the patient does not proceed to convalesce as he is expected to. While in a certain percentage of hemolytic icterus cases the gallbladder develops from the hypercholesteremia and pleochromia a sufficient number of stones to cause intercurrent biliary colic attacks and operation is occasionally justified, in several experiences I have found the surgeon to be unaware of the underlying disease; whereas it is wise to hesitate always before attacking a gallbladder in the presence of an enlarged spleen.

In conclusion, then, I would plead for a comprehensive study of all chronically ill people by all the means at our disposal, with the hope of restoring a larger percentage of those who are sick in the right hypochondrium before irreparable

damage has been done to the liver, ducts, pancreas and duodenum.

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ROENTGENOLOGICAL DIAGNOSIS OF CHRONIC CHOLECYSTITIS*

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X-ray diagnosis is much more an art than a science—in other words it depends for its more accurate accomplishment largely upon the experience of the diagnostician. Especially is this true in the diagnosis of gallbladder disease since it is only through experience in this field that one gains the necessary confidence to rely upon the slight, often variable roentgenological signs of gallbladder disease.

Statistics.—It seems futile to speak of diagnostic results in this domain in terms of percentage, since most negative cases are not checked either by autopsy or operation, and it is therefore impossible to know how many cases of actual gallbladder disease are passed roentgenologically as negative. The writer prefers therefore to speak of his results in terms of impressions based upon case histories both before and after examination, as well as upon the results of operations performed either under a diagnosis of gallbladder disease, or for the relief of other symptoms.

The possibility of chronic cholecystitis requires consideration in practically every case referred to the roentgenologist for gastro-intestinal study. This is true because most cases so referred are atypical in their clinical manifestations. A critical review of the histories of our series of gallbladder cases would seem to indicate that the symptoms frequently suggest peptic ulcer but that they point even more often and more strongly to some form of gastric neurosis. Many of these patients complain of epigastric distress or "gas pains," occurring with considerable regularity after the ingestion of food, and not infrequently relieved by food or alkaline medication. When, in such cases, the *x*-ray examination wholly fails to reveal any evidence of gastric or duodenal ulcer, the gallbladder comes under suspicion and every effort is made to elicit roentgenological signs, either direct or indirect, of chronic cholecystitis. If this effort is equally barren of results and the case is referred back to the clinician with a negative report, the chance of an organic lesion in the upper abdomen is reduced by a very large percentage.

Technic.—The technic of the gallbladder examination is simple but important. Success is in direct ratio to the thoroughness with which the *x*-ray examination is conducted, and co-operation on the part of both patient and referring physician is essential.

As a rule, no preparation except a twelve-hour starvation period is advisable, since experience seems to show that the employment of cathartics and enemas tend to increase the hazards of diagnosis. A series of roentgenograms of varying densities are made with rays of different degrees of penetration, and deveolped with special care to avoid over-development. The entire right half of the abdomen, from liver margin to pelvis is included in the *potential* gallbladder area. Best results are obtained without the moving Buckey grid, since it removes the gallbladder too far from the plate; but some of the series are made with the aid of this apparatus to add variety.

Following this series of roentgenograms, a routine gastric examination is made to (1) exclude ulcer or carcinoma, (2) seek indirect evidence of gallbladder involvement, (3) demonstrate any distortions of the cap due to gallbladder adhesions and to differentiate them if possible from ulcer deformities, (4) look for certain characteristic impressions of the pathological gallbladder upon the pars pylorica or cap and (5) to seek evidence for or against any abnormality in the ileo-cecal region which might explain the patient's symptoms.

The normal gallbladder.—The outline of the normal gallbladder is not seen roentgenographically because its density is approximately the same as that of the stomach and bowel walls with

*Presented in symposium on Diseases of the Gallbladder before the annual meeting of the Minnesota State Medical Association, St. Paul, October, 1923.

which it is in close proximity. There are probably exceptions to the rule that the normal gallbladder is not demonstrable, since rare instances of this kind have been reported. Thus, it is conceivable that a normal gallbladder temporarily distended with bile might offer the necessary contrast with duodenum and colon, especially if these chanced to contain quantities of gas.

The pathological gallbladder.—When the walls of the gallbladder become thickened by disease, or when it becomes filled with stones or exudate of a higher specific gravity than normal bile, there is offered the necessary conditions of contrast to surrounding tissues, to make its outline visible upon the roentgenogram. Rieder reports such a case, in which the chemical examination of the gallbladder contents gave the following result:

Water, 4 per cent; cholesterin, 80.9 per cent; bilirubin, .46 per cent; inorganic residue, of which a considerable part was calcium, 10.4 per cent.

Any gallbladder with pathological contents of this character should prove rather easy to differentiate. In the more acute cases, these inflammatory changes having not yet taken place, diagnosis upon any direct roentgenological evidence is impossible, but here the reflex disturbances in the function of stomach, duodenum and colon are most prone to occur and these serve to point the way to the correct diagnosis. That the chronically diseased gallbladder will escape roentgenographic detection in a certain unknown percentage of cases even with the most careful technic is probably true. But this percentage is becoming considerably smaller with improving technic and more intensive roentgenological study.

Stones.—The actual visualization of gallstones in the roentgenogram is, in the writer's experience, only infrequently accomplished. They escape detection either because their lime content is extremely small, or because the thickened gallbladder itself or its dense semi-liquid contents, does not offer the required contrast in density. The isolation of stone shadows, though satisfying and conclusive, is no longer the sine qua non of the roentgenological diagnosis, and the aim of the roentgenologist should be to so perfect his technique that he can demonstrate the more massive shadow of the gallbladder itself.

Artificial Aids.—Recent efforts to increase contrast by injecting air or CO_2 into the colon or duodenum have met with only indifferent success. The employment of artificial pneumoperitoneum doubtless brings many stones into relief which would otherwise escape detection, but the writer has always felt that the dangers of this procedure precluded its routine employment for diagnostic purposes.

Reflex Signs.—Certain rather characteristic disturbances in the normal peristalsis and motility of the stomach and duodenum occur in a large number of gallbladder cases. They may be enumerated as follows: (1) protracted emptying time, associated with gastric hypertonicity; (2) gastric spasticity, especially in the pyloric region; (3) pyloric insufficiency often associated with tonic contraction of the pyloric antrum.

Comment—Keller reports a case of circular spasm of the duodenum which yielded visibly under the anesthetic during operation for chronic cholecystitis. The delayed emptying time occasionally observed in gallbladder cases may be differentiated from that seen in obstructive duodenal ulcer by the absence of the characteristic hyper-peristalsis so common in the latter condition. The spastic contractions of the pars pylorica and duodenum are often associated with a marked spasticity of the colon which Mills considers a reflex reaction to the cholecystitis. Pyloric insufficiency manifests itself by a rapid passage of barium ingesta through the stomach and duodenum but this may be followed by pyloro-spasm so that the ultimate emptying time of the stomach is increased instead of shortened.

Lesser Signs.—Another sign which may have some diagnostic value is the dilated duodenum with or without stasis. The persistence of a barium residue in the duodenum after the stomach is empty, spoken of by some authors as the "persistent duodenal spot," is of undoubted value as an indication of gallbladder disease with adhesions about the duodenum. The demonstration of a dilated ampulla of Vater is also regarded as significant but in the writer's experience is very rarely observed.

Alterations in Position or Contour of the Pylorus or Duodenum occurring either as a result of pericholecystic adhesions or of encroachment upon the filled stomach or bowel by the enlarged and thickened gallbladder present a valuable group of roentgenological signs. The descending part of the

duodenum may be pulled upward and to the right so that it appears fixed under the liver. Adhesions may effect a pull upon the horizontal part so that the cap appears distorted. To differentiate this distortion from the deformities seen in ulcer it is necessary to examine the patient in various positions, and especially in the right lateral. The plate series may fail to show an entirely normal cap but the constant and unchanging deformity of ulcer is not present.

Pressure defects of the pylorus, cap or hepatic flexure are very characteristic. As a rule they do not even remotely resemble the filling defects of carcinoma but are very apparently due to pressure from some extrinsic mass. They sometimes appear only in the prone position but probably never occur as a result of pressure by a normal gallbladder. When these cup-like impressions are observed they are practically pathognomonic of a thickened or a distended gallbladder.

Ileocecal Region.—When only minor indications of cholecystitis are present these may be due to reflex reactions to some lesion in the ileocecal region. It therefore becomes necessary in such cases to carry the examination further and to attempt to demonstrate ileocecal or appendiceal stasis. If the examination of this region is also negative some weight is indirectly added to a gallbladder diagnosis.

Conclusions.—While roentgen signs alone are conclusive in many cases, there are others in which they are only contributory to the ultimate diagnosis. When they are inconclusive, the absence of other demonstrable lesions to account for symptoms has an important bearing. The clinician should not fall back upon the convenient but usually erroneous diagnosis of gastric neurosis, until every means available for the exclusion of an organic lesion has been thoroughly exhausted. Even then, such a diagnosis should be made subject to revision.

A gallbladder study should be included in all routine gastro-intestinal examinations.

The roentgenologist's report should be weighed by the character of the objective signs upon which he bases his opinion. When direct and typical, roentgenological signs are far more diagnostic than when they are indirect or reflex in character.

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THE SURGICAL DIAGNOSIS OF GALLBLADDER DISEASE*

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I have interpreted the term surgical diagnosis to indicate that situation where the general examinations have led to an operation; the incision has been made, pathology in other organs has been proven or excluded, the biliary system has been exposed and the question arises as to the kind and degree of disease present.

This aspect of the subject requires the discussion of methods of examination and their interpretation in terms of surgical pathology. It is here that the man who has served his years of apprenticeship or who has developed his own cases and recorded them not only on paper but in his own mind and particularly he who has followed his cases to the laboratory, who is in a much better position to judge than the man who has been taught or has

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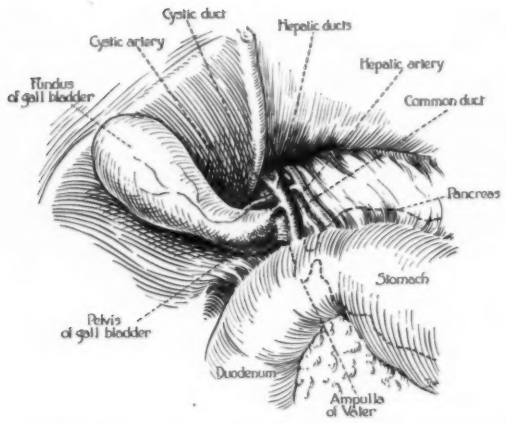


The field of surgical diagnosis is here illustrated. It is examined to determine (1) the kind and degree of disease, (2) the anomalies, (3) the position and disposition of the structures in reference to the feasibility and selection of operative steps.

come to view this whole subject as a debate of the relative merits of cholecystectomy and cholecystotomy.

A review of the methods of examination requires consideration of elementary facts and rules. The word rules is used advisedly because no standard routine methods can be acceptable to every operator; but it is a wise surgeon who develops his own sequence of steps. In many instances with special tables, rotation of the liver, disposition of the pads, posture and position, it is possible to visualize all parts not anatomically hidden; but not infrequently the important structures such as the common duct, the pancreas, and ampulla are most deeply seated. Exposure of the latter two requires operative steps not to be lightly undertaken, while routine opening of the common duct is in no wise indicated. In these structures pathology must be determined by palpation and successive cases should be examined in the same manner and systematically for the sake of comparison.

The parts to be examined are: (1) the gallbladder—fundus and pelvis; (2) the cystic duct; (3) the common duct; (4) the pancreas; (5) the duodenum at the site of the ampulla; (6) the hepatic ducts; (7) the lymph glands; (8) the liver.

These are to be noted: (1) the disease; (2) anatomical anomalies; (3) position and disposition of the structures with reference to the feasibility and selection of operative steps.

The fundus of the gallbladder is the most frequent site of macroscopic disease, the most evident and accessible organ, and the first examined. Normally flaccid and compressible, it may assume most extraordinary changes.

Non-compressibility indicates obstruction to the cystic duct, impaction of the gallbladder lumen by stones or new growth or inflammatory production in its walls. Interference with its ready collapsibility is a most evident sign of disease.

Color in the reds is a positive sign of inflammation but the importance of this observation lies in our ability to determine the degree as to whether there is present an acute, a sub-acute or a chronic process.

In the greens there is a chance of confusion between bile stain and gangrene but the latter is associated with a feel of flaccidity or loss of resistance that can hardly be mistaken.

The white areas vary so greatly in extent and degree that they are the most difficult to interpret. It is probably most reasonable to consider them as indications of past inflammatory processes, which have resolved and are of no moment unless associated with other findings.

The size may vary from the small contracted obliterated gallbladder to enormous dimensions so large as to be confused with tumors in other organs. Any great variation in size must be due to mechanical cause or disease usually associated.

The fundus should also be examined as to its attachment to the liver with particular reference to the possibility of protecting denuded liver surface, should removal of the gallbladder be performed.

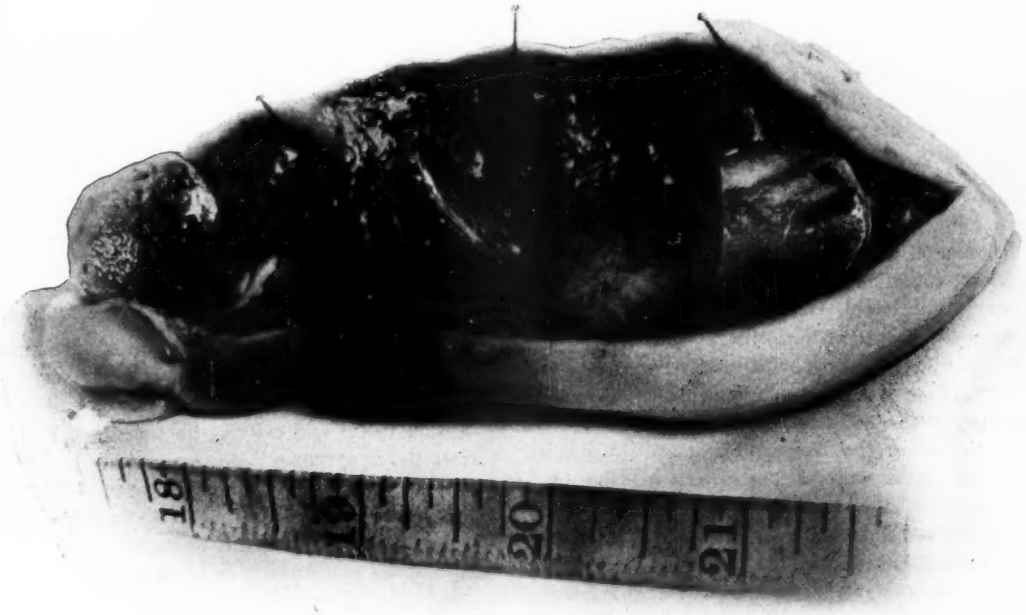
I am well acquainted with the recent literature upon the subject of drainage and toilet, but I firmly believe that in the inflammations failure to successfully cover this area is an explanation, if not of catastrophe, at least of stormy convalescence. I also believe that the demonstration of close attachment may possibly be a deciding factor in our course of treatment.

The gallbladder can be successfully palpated for foreign bodies only in state of complete collapse; while gross stones are readily felt it is seldom they can be counted, and bird seed stones are most elusive. This palpation should be most carefully and gently done, particularly in the normal borderline cases, as rough handling or grasping with forceps may cause mucous membrane traumatism and thus produce a situation where pathology may be created instead of relieved.

The pelvis of the gallbladder is most important not so much from the pathologic as from the surgical standpoint. Its position and relation must be carefully studied as it is at this point that most of the operative mistakes are made. Curving quite frequently in the long axis of the common duct, quite constantly attached to it by tissue which probably constitutes congenital reflections, when inflammatory processes occur we may have a serious problem to decide between, pelvis and cystic on the one hand or pelvis and common duct on the other.

located by its relation to the artery and foramen of Winslow. The operator standing at the patient's right can cover this structure by using the right hand in extreme pronation or standing at the patient's left using the left hand in supination. Of course if the duct can be brought up, standing at the patient's right the left hand can be used in supination. The point is that the index finger in the foramen gives best control.

This maneuver also seems to prove or exclude changes in the pancreas and the lower part of the duct down to the duodenum.



Subacute cystic gallbladder recently successfully removed.

The cystic duct is usually hidden and can only be demonstrated by dissection. It varies in length, may be distorted or may be dilated by foreign bodies. When it is involved, one of the most difficult problems of technic in the surgery of this disease arises, requiring extreme care and ingenuity to properly read out the condition. Ordinarily the duct can be completely visualized by dissection and I believe that failure or inability to do so is the cause of many serious complications.

The common duct because of its position is most difficult to palpate when normal and it can only be

The pancreas can ordinarily be felt. There is a symmetrical feel in a normal organ. All parts of it seem alike; so any change in any area must be due to a disease and indicates further examination. There are several plans for its exposure involving great care and it is possible to injure essential structures. Their selection depends upon the position of the stomach and duodenum. The avenue carrying the least possible risk is through the gastro-hepatic omentum.

Fortunately pathology at the lower end of the common duct is not found so frequently as for-

merly when most of our cases presented long histories and only came to operation when imperative indications arose. With our improved methods of diagnosis and earlier operation, involvement here is less common. Often the case gives the story of chill and jaundice and is approached with a diagnosis of a common duct process only to find the cause at the pelvis of the gallbladder or in the cystic duct with impingement on the common duct. Any dilation of the common duct indicates that its lower terminal is to be exposed through its lumen. Trans-duodenal investigation of the ampulla is only justified by exceptional circumstances.

The upper end of the common duct is the usual site of an anomalous course of the hepatic duct. At the first operation it is seldom that this is demonstrated. Most of the literature in this connection consists of reports of cases shown at second operation in the effort to explain some complication.

The liver must receive more attention. The splendid studies of Graham and his associates upon the relation of the liver and gallbladder in inflammatory conditions opens up a field of observation hitherto neglected. They indicate that we must resurrect the term hepatitis. They show that changes in the right lobe of the liver may be gross enough to give us macroscopic evidence of possible disease in the gallbladder. They prove the close association of the liver and gallbladder through the lymphatics and that the process may be retroactive. We have long known the connection of the liver with vast areas any one of which may be a source of infection. The lymphatic connection completes a hemato-lymphatic route of infection and thus demands a careful study of the liver, because this organ is a most important link in the chain.

The question arises whether we should in every case section the liver. So far as I have seen no penalty is attached to removing a piece for this purpose. These studies lead often to macroscopic observation and thus furnish added positive evidence in our border line case. This is a more recent and important field in surgical diagnosis.

The whole tendency of our literature, whether from case history studies such as recently presented by Alvarez or from experimental, clinical and pathological reports just mentioned, is toward cholecystectomy. The evidence is so positive that it suggests the propriety and need of reviewing these textbook points in surgical diagnosis because if there is only one form of treatment why debate the problem at all?

But there are surgical conditions and technical difficulties, which if disregarded lead to a primary mortality which can be minimized by conservative surgery.

I may be wrong or at least put it too strongly in saying that the general attitude of the surgical profession is that it is a defeat to drain a gallbladder.

We may all agree that this procedure may be incomplete; but if in certain cases it is so considered, we may still frankly inform them thus preparing them for follow up treatment at a more favorable time. Secondary operations may be most difficult and at times extreme procedures for the surgeon to perform; but it is my experience that the patient withstands the many times severe manipulations without reaction. The explanation is that a peritoneal field once abused never again reacts to either traumatism or infection in the degree of the first invasion.

I have mentioned the red gallbladder and its interpretation as a positive indication of inflammation. I do not believe that any one with experience will fail to differentiate between red gallbladder from cystic and extra-cystic cause. With the former the importance lies in our ability to determine the degree; whether the process is acute, ascending in virulence or declining in activity or practically quiet; whether it has attacked a previously normal gallbladder, or is an exacerbation of a subacute or chronic process; whether it is due to an infectious process or simply a mechanical exhibition of obstruction or pressure.

There is a group of cases described under the term acute cholecystitis in which radical surgery at the first sitting should never be undertaken.

The difference of opinion on this score is due to an uncertainty of definition, fostered by our effort to indicate a clinical state by the use of a pathological term.

The local condition may be most evident pathologically but the surgical interpretation must include consideration, before operation, of the constitutional reaction, the possible effect upon an already sick patient from the superimposition of traumatism and the creation of new avenues of absorption, and also the possibilities of repair, pro-

tection and prevention. With development of technic, augmented experience, personal expertness not only operative but in choosing the time of surgical attack, this field may be ever narrowing. Clinical acute cholecystitis calls for acute surgical judgment.

The next field of importance is that of determining between malignancy, the perforative lesions and the small contracted gallbladder. When this question arises every effort and every risk should be taken to conclude a diagnosis.

There is no more dissatisfied feeling than to retire in uncertainty on this matter. Demonstration of malignancy is mostly of value in prognosis, thus preventing subsequent procedures unless for palliative measures.

In the perforative lesions, there is often present on palpation at operation the feeling that only a part of the gallbladder is involved and that at the questioned point it is adherent to something else—the duodenum or exceptionally the stomach—while perforation in the liver gives a feeling of fixation at a part of the gallbladder.

Malignancy has a tendency towards involving the whole—as though it was a dead contracted gallbladder. Often it is impossible to differentiate without microscopical studies. In the large gallbladder I have seen adeno-carcinoma involving all surfaces and even extending into the ducts.

Usually in the perforative lesion there is extracystic evidence of inflammation which should lead us correctly. In this field where often the inflammation is burnt out and even gross quantities of pus demonstrated, radical surgery is indicated as strongly as are conservative methods in the acute forms.

In the pancreas changes are most difficult to differentiate. It is not hard to determine that there is a change, but to definitely decide between malignancy and inflammation our conclusion is so often a hope that it is not the former. Recourse and help must come from a consideration of the history and duration of events, age of the patient and local findings in other organs.

The acute forms of pancreatitis may present some diagnostic findings. They are usually operated upon with a diagnosis of gallbladder disease, although in two more recent cases nothing more was possible than a diagnosis of an acute abdomen. The presence of bloody ascites is quite a characteristic finding and may be in such quantity as to suggest ruptured ovarian cyst. In the last case of acute pancreatitis, closely watched over several months with recurrent attacks of cholelithiasis finally reaching imperative surgical state, the liver was startlingly pink. If this fluid is quite constant in the severe forms is it not possible to argue backwards and say that small amounts of fluid may be indications of the milder forms?

In gallbladders showing gross pathology (cystic, contracted, perforated, herniated, infiltrated), the function if not dead is at least impaired and the indications are positive. The question in an individual case is the feasibility of radical procedures. In the border line cases it is not possibility but the necessity that is the question. These cases embrace those with white spots of the fundus, with pericystic adhesions, the much discussed strawberry gallbladder, ones that are still compressible and retain, so far as possible to demonstrate, all functions. These offer the field for future study.

It is well for us to admit that we are criticizing each other for taking out this type of gallbladder or leaving in that gallbladder, that this man is too aggressive and that one is too conservative. Some explanation may be made by the fact that many of us spent our active years during the development of this whole subject, have clung to early experience with gross pathology, have a tendency to view new suggestions with suspicion, and are too placid in the acceptance of old teachings regarding the avenues of infection. Why study these things because it is not possible to demonstrate the source in each and every case?

The newer suggestions render it important that we clinically prove or disprove the hemato-lymphatic route because it emphasizes the liver. This is accessible and can be studied. Demonstration of changes in the liver will then indicate and justify the early removal of the gallbladder even in those cases apparently normal. My personal feeling is that I do not care to remove this group as a matter of form or routine or merely on the history, but must demonstrate the pathology either local or remote.

This group will be greatly increased if we are able by exact and careful study of the case to operate earlier. Thereby the field of surgical diagnosis will be greatly broadened.

SURGICAL TREATMENT OF DISEASES OF THE GALLBLADDER AND BILE CHANNELS*

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Since the first cholecystectomy forty-one years ago the surgical treatment of diseases of the biliary tract has been a subject of importance for the surgeon, until of late years it has commanded the most active attention. The surgical views and experiences as reported in the literature are not yet standardized, though the large experience of many surgeons and the enormous material of a few has brought most satisfactory light and results into this chapter of surgical achievement.

The time allotted is so short when compared with the large field to be discussed, that in order to get anywhere at all and to give this paper any raison d' être, we will simply touch upon a few points of interest.

Old age is no absolute contraindication to operation, if we are confronted with bile obstruction or pronounced misery. Such a patient may well be taken into the counsel, after putting the chances openly before him, and, if the conditions of heart and kidneys are not prohibitive, he may decide whether he wants to go on with his pain or take the chance of operative relief. A bad heart, if not too bad for any kind of major surgery, is not an absolute contraindication either. It may be greatly improved by a successful operation. Quite often the patients are abnormally fat. If the general status is satisfactory, the fat in itself is of course no reason for desisting from operating—the skin incision is simply made larger, while the fascia wound remains of ordinary size. Even ascites and biliary cirrhosis do not absolutely prohibit surgery; nor does diabetes. All three may be better after operative recovery.

The most important chapter, as it represents the greatest number of cases, is cholecystitis. The question whether drainage of the gallbladder or excision of this organ be preferable in inflammatory conditions has been decided by the great majority of surgeons for the great majority of cases in favor of cholecystectomy. Only now and then do I find a case of cholecystostomy in our records of the later years. The cases with much history and little findings are dangerous ground for the surgeon. Many of these patients are of the neurotic type, and drainage for any length of time with its consequences is almost sure to bring these people back very soon with the same and more complaints. If, however, in such a case the gallbladder appears enough incriminated, a clean excision without abdominal drainage is the proper procedure. In gallbladder surgery as elsewhere the surgical relief runs about parallel with the amount of pathology found and relieved.

Under what conditions is cholecystostomy advisable? Take the acute phlegmonous and gangrenous forms of cholecystitis. For a good number of years we have practically always removed these gallbladders. Nevertheless the general condition of the patient may force us at times to leave it in and to simply drain it, in which case ample free drainage of the whole territory must be procured through the wound and often also through a lumbar opening. The field is anatomically better protected than the appendix, inasmuch as the small intestines are not in direct proximity. However, the respiratory excursions of the diaphragm hinder somewhat the desirable complete rest of the parts, and extension of the suppurative process downward along the outer side of the colon and upward into the subdiaphragmatic space is the principal danger. As to the occurrence of progressive peritonitis and generalized sepsis after operation the virulence of the preexisting infection of a given case and the handling and manner of operating is of more decisive importance than the choice between *ectomy* or simple draining. Good exposure, very gentle handling, thorough walling off and painstaking avoidance of soiling a larger area and sufficient drainage are of prime importance. It is hardly right to advise *ectomy*, however, in all these cases of severest inflammation, because extreme forms do occur where even a slightly longer operation and a small amount of harsher handling may be just too much.

Now and then in making a routine examination of the gallbladder during a pelvic operation we feel a large gallstone or two. You let an assistant re-read the whole history of the case. There is no definite indication that the stone made trouble. The gallbladder may be flabby, thin walled, not distended. Under such conditions we do not feel justified to add much operating and we have re-

*Presented in symposium on Diseases of the Gallbladder at Minnesota State Medical Association meeting, October, 1923.

peatedly simply made a small (perhaps 2 inch) incision upon our fingers inserted through the low abdominal incision, pushed the gallbladder into the wound, grasped it, removed the stones, sewed in a rubber tube with two or three inverting purse string sutures and dropped the gallbladder back without further drain or suture except one or two silk-worms for the abdominal wall. In such a simple case we have even—as an exception—closed up the gallbladder and abdominal walls without drainage, though this so-called "ideal cholecystotomy" is usually not so very ideal. Let us consider what local changes we create by drainage of the gallbladder. Take the case just mentioned, a rather normal looking gallbladder with one or two stones. You open it and cause some bleeding; you remove the stones and cause some abrasions; you sew in a rubber tube which has more or less sharp edges. A little blood remains in the gallbladder after you close up, or accumulates later. The pressure of the tube may cause a decubitus near its free edge, and a certain degree of contamination during the convalescence cannot be avoided. All this may invite stone formation especially in a gallbladder which had this tendency before. Like probably most surgeons, I have removed large stones six months after a cholecystostomy with an apparently clean removal of all the stones. Therefore, if cholecystostomy is to be performed, we have to treat the mucosa very gently; must guard against accumulation of blood; the rubber tube should not be too rigid, should not be inserted too deep and ought to be brought out of the abdomen in an easy course, more or less in the direction of the long axis of the gallbladder.

Again a simple drainage operation is preferable in a severe cholemia, particularly when we have to deal in an elderly patient with a dilapidated condition. The simplest possible operation to establish an outlet for the bile is here in order. A cholecystostomy under local anesthesia and without any fixation of the gallbladder to the abdominal wall is the best. Under local anesthesia? Not really local, but rather regional, by injecting the 0.5 or 0.25 per cent novocain solution somewhat away from the line of incision, with no adrenalin added. Thus a possibly fatal post-operative hemorrhage may be averted in these deeply jaundiced cases. The skin can even be simply infiltrated with normal saline solution.

In this connection I should mention the great benefit derived from the administration of calcium salts. Last fall a severely jaundiced man of about forty-five years was brought into the hospital with a stone in the common duct. The coagulation of his blood was still incomplete at the end of thirty-five minutes, the longest we have ever observed including even hemophiliacs. With calcium administration intravenously and per os the coagulation time was reduced to eight minutes within four days. The stone was removed from the common duct, a cholecystectomy was added and the recovery was uneventful.

Is it better to preserve the gallbladder for drainage in cases of marked swelling of the pancreas? When in acute cholecystitis the pancreas is swollen and of the nodular or lumpy type, it can safely be taken as a comparatively less important concomitant swelling, secondary in importance and directly due to the infection of the gallbladder. It recedes after cholecystectomy, which is therefore the proper treatment for it. An instructive case might be mentioned for illustration. A lady of about thirty years was operated upon for gallstones with a moderate inflammatory icterus. The head of the pancreas was greatly swollen, forming a regular pyramid protruding forward about 6 centimeters. The gallbladder was emptied and drained. This was ten years ago. The patient was at first much improved; but after some months she did not feel as she should have felt, and two years after this operation we had to go in again. Again the pancreas was greatly swollen. This time we removed the gallbladder, had a much shorter convalescence and the patient remained cured.

Drainage of the field of operation. In cholecystostomy, unless the case is a very infectious one, there need be no drainage besides the tube in the gallbladder. In cholecystectomy, in case the field is soiled with acutely formed inflammatory material or especially if in addition troublesome oozing exists, it is safer to drain. The drains are preferably of soft collapsible rubber, if the infection does not appear too virulent. If free drainage is necessary, rubber tubes are safer. Gauze drainage we use only exceptionally under stress, and even then we try to protect the intestines and the abdominal walls as much as possible from its contact by soft rubber. The benefit of gauze lies in its firm agglutination to the wound, consequently in its hemostatic effect, and in its capillary suction. The latter becomes ineffective in a few hours,

as soon as the meshes are filled with thick material. The firm agglutination to the tissues creates a prompt and good walling off of the field, but the trouble starts often when we remove the gauze. A number of years ago I had to give a general anesthetic in such a case in order to remove the gauze drain, which we had tried to free for several days by twisting and pulling. A unique sad experience we had in another case, which may serve as a warning. It was in the days when gauze drainage was still commonly used. Six days after an absolutely uneventful cholecystectomy for stones we removed a thin long gauze drain. Some adhesions must have been torn by this somewhat too early removal and a fatal peritonitis followed. Since then we avoid gauze drainage almost entirely.

In the last two years most of our cholecystectomies were sewed up tight; but now and then it appears safer to insert a drain. It does not seem to be generally known that ten years ago some German surgeons advised tight closure without drain even after suture of the common duct. They were then fought vigorously by Kehr, and the innovation died away. If draining with a narrow strip of soft collapsible rubber does not cause severe adhesions, does really not lengthen the whole wound healing, and in fact, hardly drains sufficiently when free and ample drainage becomes necessary, why should it be an object of controversy, as long as it gives us in a doubtful case valuable information and additional safety? On the other hand it must be acknowledged that the keen surgeon who is able to operate on the common duct without drainage, has taught us some important things as to the capabilities of the peritoneum, observations very valuable for our work, though we may make only partial use of them. It is at least a comfort to us, even if we choose to tie ourselves to a rope when venturing over the glacier with its snow-hidden crevices, to know that somebody is walking free in front of us. Let us admit that barring accident he will get across before us and thus may avoid other dangers.

As to complete closure of the common duct without any drainage, the degree of post-operative swelling at the papilla through traumatism cannot be foretold. It seems therefore advisable after operation on the common duct not only to make sure of the permeability of the papilla but to dilate it gently to give free outlet for any possible chips or debris from stones. A very grave complication ought to be mentioned in this connection, one where the most unhampered exit for the bile must be secured; this is in the cases of so-called white bile. All these cases are severely jaundiced, and anything must be done to facilitate the resumption of activity by the liver. We have had only three such experiences. In one, stones were found in the gallbladder, in the common and hepatic duct and far up the hepatic branches. Insertion of the scoop in any direction into the liver channels was answered by a gush of partly clear, partly whitish fluid. On the evening after the operation there was a little bile staining on the dressings and the case recovered. In the second case normal bile showed up after twenty-four hours, and that patient got well, too, while the third case died after five days without producing a drop of normal colored bile.

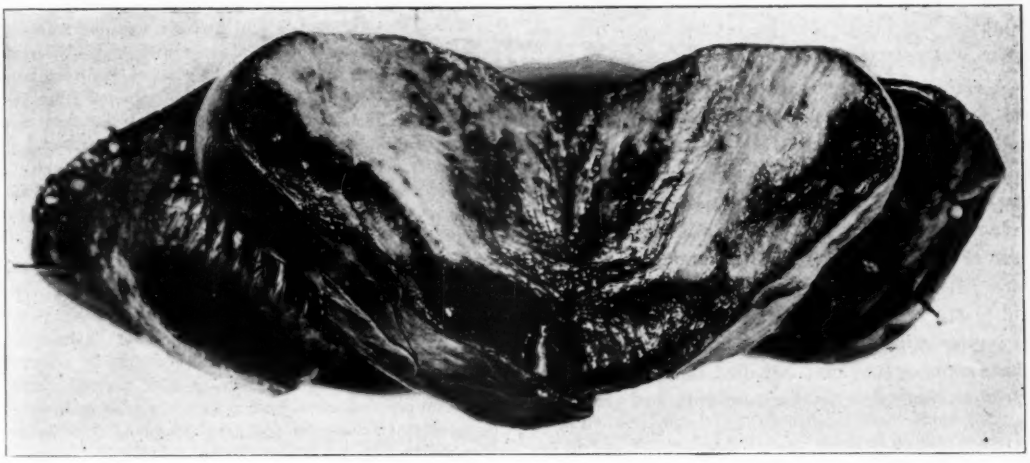
Among the complications encountered in gallstone surgery part are due to numerous anatomic anomalies of the deeper structures with which the surgeon must be familiar, part to perforative and neoplastic consequences of cholelithiasis. Biliary fistulae on the abdomen are mostly tortuous and often contain large stones. The tract must be excised and the gallbladder removed. Internal travelling of gallstones by slow perforation is again an important chapter. You might permit me to mention an occurrence which illustrates exceptionally well this wandering of a stone. This gallstone, of the size of a walnut, was found embedded in a fibrous mass underneath the gallbladder. After removing the stone, three perforative openings could be seen from the interior of its fibrous encapsulating shell, whose walls were about 1 cm. thick. One opening admitted the tip of the index finger and led into the gallbladder, another with a diameter of half a centimeter led into the duodenum, while a third one, a little larger, connected with the transverse colon. The stone was thus at the parting of the ways, one road leading through the duodenum probably to a gallstone ileus, the other through the direct route of the colon possibly to a self-cure.

One mishap which is rather frequently reported of late, is injury to the hepatic or common duct. Mostly a portion of it was removed with the cystic duct. This may occur in severely inflamed adherent and thickened gallbladders where the anatomic structures are not definitely recognizable. The hepatic duct is then much smaller than the cystic, and we have seen it embedded in the bulky wall of the cystic duct. In one such case we removed by

accident (incredible as it seems) the whole hepatic duct up to its bifurcation into the right and left hepatic branches. Fortunately the condition was recognized by a close examination of the specimen immediately after the operation. The patient, a woman of sixty-nine years, could not have stood more operating at that same session. Sufficient drainage had been provided for. Six days later a medium sized catheter was inserted into the left hepatic duct and the lower end through the remainder of the common duct into the duodenum. The catheter was attached to the stump of the cystic artery which happened to present itself as a fixed point. The common duct was easily brought up to the point of emergence of the catheter from the liver. The catheter is still in place after two years, and the patient is free from pain, jaundice or any complaint, and is very active for her seventy-one years.*

removed. It seems best not to use too much force, as fragments may remain behind, but rather to make the opening large enough for free peeling off of the wall from around the stone. The introduction of a gauze pad above the liver to render the parts more accessible, as advised by Mason, has helped us in some cases. Kocher's mobilization of the duodenum by a paraduodenal division of the peritoneum along the right border has helped us at times to get better access to the retro-duodenal part of the common duct, which here rather frequently runs not only through a groove but a complete channel of pancreatic tissue, which can safely be divided. When the stones are too far down for this method, the transduodenal route is the proper approach. It is not as serious an operation as it may appear to one who has not yet done it.

That the cholecystostomies have as large a mor-



Specimen removed at operation. Gallbladder carcinoma invading the adjoining liver area.

If the anatomy is not definitely recognizable, it is best to free the gallbladder from the fundus inward. The risk of injuring the hepatic duct or other structures is considerably lessened. At times the anatomy is so much blurred that one is forced to cut the gallbladder open on its under side after tapping it, and then to crawl along the cut edge with forceps until one has the cystic duct with its valves before the eyes.

At times a stone may be as though grown into the wall of the common duct and can hardly be

tality as the ectomies, as several writers report and as is true also in our material, is readily understood, because the more hopeless conditions are relegated to a simple drainage operation. Our operative material comprises exactly four hundred cases. In three hundred cholecystectomies, counting all kinds of conditions, as gangrenous gallbladders, peritoneal or adjoining liver abscess, common and hepatic duct stones, severe icterus and carcinoma cases, the mortality was 4 per cent. In the cholecystectomies of the last six years (including choledochotomies, etc., but excluding the malignant cases) the mortality was 2.8 per cent.

*Case reported in October number of "Surgical Clinics of North America," 1923.

Two more words concerning malignant changes. Apart from a very few fortunate recoveries for various, mostly short, periods of time after excision of a small carcinoma of the papilla of Vater, the chapter of malignant disease of the bile ducts is an exceedingly hopeless one. The diagnosis is quite often not definite as to exclusion of an obstructing calculus. The diagnosis may remain uncertain even after operative inspection, which in the presence of severe icterus and a poor general condition at times cannot be sufficiently deliberate. Drainage of the gallbladder in malignant disease may relieve an intolerable itching and bring some deceptive hope, but rather hastens the end through loss of body fluid. An anastomosis between gallbladder and intestine avoids this latter and the great discomfort of an external fistula.

Carcinomata of the gallbladder, if caught by accident at an early date, may be completely eradicated. The cases reported were mostly gallbladders removed for other reasons, where a small carcinoma was detected afterward in the specimen.

A rather advanced carcinoma of the gallbladder we removed by resecting the liver. The neoplasm had started at the fundus and had grown into the adjoining liver tissue. The area of the cystic duct was, however, free. A triangular piece of liver tissue was removed with the gallbladder; it had a base at the liver edge of 10 cm. and a height of 9 cm. After a smooth operative recovery the patient did pretty well for a while, but soon showed signs of implantation tumors in the bottom of the pelvis (Kruckenberg tumors), and died nine months after the operation. Locally the condition had remained good.

DISCUSSION ON THE FOUR PRECEDING PAPERS— DISEASES OF THE GALLBLADDER

EVARTS A. GRAHAM, M.D. (St. Louis): I feel highly honored at being asked to come here and participate in this symposium. There is nothing that is of more interest to me, and I feel that the subject is a very live one to everybody. I feel particularly that any additional light that can be thrown on the subject of cholecystitis and its various complications is of the utmost importance because it is such a common complaint. We are much more interested, of course, in the common things that we are in the rare and unusual things. My interest in this matter began in 1916 and then I was interrupted somewhat by the war. I took it up again subsequently to the war and have followed it ever since.

I feel that no rational therapy of these conditions can be undertaken unless we have a proper conception of what it is all about; in other words, of the pathogenesis of the condition, the pathology involved, and so forth; because, of course, a rational therapy is always based on such findings. You are familiar, of course, with the common conceptions of the origin of cholecystitis and its complications; and remember, of course, that the first ideas that were expressed were that bacteria got up the common duct and then got into the cystic duct and then into the gallbladder. Originally it was supposed that they got up there through the lumen of the ducts; that the bacteria swam up against the current of the bile and got into the gallbladder. Somewhat later, along about 1890, Birch Hirschfeld advanced the idea that bacteria are washed down in the bile from the liver into the gallbladder. Particularly through the work of Rosenow, and simultaneously with him, I might say, but from a somewhat different angle and entirely independently, the work of Koch brought evidence to show that cholecystitis very frequently is due to a blood stream infection involving the wall of the gallbladder through the cystic artery. We know, also, that the gallbladder may frequently become involved by contact with an inflamed ulcer.

It has been an old observation, of course, that cholecystitis is a comparatively frequent late complication of typhoid fever. Koch, the man to whom I referred a minute ago, concluded that the typhoid cholecystitis was due to aneurysm in the wall of the gallbladder with typhoid bacilli. It is a curious thing that Osler, in a series of fifteen hundred cases of typhoid fever which he reported from the wards of the Johns Hopkins Hospital, found only seventeen instances of cholecystitis coming on while the patient was in the hospital suffering from typhoid fever. Rolleston, in his classical book on diseases of the liver and the gallbladder, states that cholecystitis is rare during the course of typhoid fever.

These views are of particular interest because if bacteria infected the gallbladder by coming in contact with the mucous membrane one would expect that cholecystitis would occur in nearly a hundred per cent of cases of typhoid fever; for it is well established that in cases of typhoid fever the bile is swarming with bacteria at all times, and certainly after the first few days. There is therefore plenty of chance for any case of typhoid fever to develop cholecystitis if the explanation of it would be merely a contact infection with the mucous membrane.

Unfortunately, it has happened that most of the work on the pathology of cholecystitis up to within the last very few years has been concerned almost entirely with the study of the mucous membrane of the gallbladder. This unfortunately has been the case not only with the pathologist but with the surgeon as well. Indeed, forms of therapy have been advanced based on that idea. Matters of diagnosis, also—as were alluded to by Dr. Schneider—have been based on the assumption that it is the mucous membrane part of the gallbladder which is chiefly involved in any given case of inflammation. A simple microscopic examination of a fairly large number of gallbladders removed at operation showed us the very obvious fact—which I think everybody is agreed to now—that it is not the mucous membrane which is solely involved in cases of cholecystitis, or, indeed, it is not the mucous membrane which is chiefly involved in by far the majority of cases. The chief inflammation in the

vast majority of cases of cholecystitis is in the wall away from the mucous membrane, in the part of the wall at the periphery of the gallbladder. I do not think there can be any possible question about that at the present time.

Therefore the fact that we find microscopic evidence of the inflammation being away from the mucous membrane and the fact that in cases where we know the bile is swarming with bacteria cholecystitis is comparatively infrequent, forces us to the assumption that an ordinary infection of the mucous membrane by contact with bacteria must be relatively rare. When we put this to the actual experimental test we find again that it is relatively impossible, in animals at least, to infect the gallbladder by putting bacteria—even tremendous doses of bacteria—directly into the lumen of the gallbladder. The only way that we can produce a cholecystitis by this means is to injure the gallbladder first or to prevent its drainage by ligature of the cystic duct. If we injure the gallbladder—either by putting in a foreign body or by interfering with the circulation, by ligating the cystic artery—then we can produce a cholecystitis by the direct injection of bacteria. Otherwise it is practically impossible to do so.

So we must seek some other explanation for the pathogenesis of cholecystitis than merely infection caused by bacteria being in contact with the mucous membrane. I have already alluded to the constructive work of Rosenow on this point. Without going into too much detail we are able to bring forward a great deal of evidence—which has already been alluded to by Dr. Ritchie this morning—to indicate that there is a very easy explanation of the pathology which we see in cholecystitis if we simply bring into play the lymphatic channels as possibilities of transfer of infection; in other words, if we simply bring the field of cholecystitis into the well known laws of the spread of inflammation in other parts of the body. It is not necessary to assume any fanciful idea or theory. We need merely bring cholecystitis into the same category as infections elsewhere in the body. We know that they spread and are transferred by way of the lymphatics. How can we do that? We can do it very simply. First of all, we find that there is a very intimate lymphatic anastomosis—the results of which also have been alluded to several times this morning—between the gallbladder, the liver, the pancreas, the common duct, and to some extent also the stomach and duodenum. We find also that when we examine the liver in cases of cholecystitis, if the cholecystitis is definite we find evidences of inflammation in the liver, usually only microscopic evidence. If the condition has been chronic, though, we find gross evidence. The same is true of the pancreas.

It is an interesting thing that clinically—as has been called attention to repeatedly—there are many types of lesions which are associated with cholecystitis. We already mentioned typhoid fever. Another one which has been well recognized and frequently commented on is appendicitis; another one is ulcer, peptic ulcer of either the stomach or the duodenum. Some cases of acute cholecystitis have been described as occurring while the patient is suffering from hemorrhoids. Cases of dysentery also have been associated with definite attacks of cholecystitis and have been reported as such in the literature from time to time.

There is one interesting connection between all of these things, of course, and that is that all these are lesions which involve parts of the body which drain into the portal system. It is therefore easy to imagine that virulent bacteria can be carried to the liver and there set up an inflammation; and the inflammation can very easily be transported to the gallbladder by way of the lymphatics, simply in accordance with the rules of inflammation elsewhere in the body. This idea differs radically from the idea which Birch Hirschfeld expressed—to which we have already referred—in that it explains the interstitial type of inflammation of the gallbladder which we usually find and does not have to consider the cholecystitis as being one which starts in the mucous membrane and then invades the gallbladder. Experimentally, it was easy to put this matter to a test and to find that the conclusions had experimental basis for their assumption; namely, if bacteria are injected into a radicle of the portal vein in an experimental animal it is very easy to produce a cholecystitis of the same kind that we find clinically; that is, a cholecystitis which begins at the periphery of the gallbladder, beginning usually also in the lymphatics of the periphery of the gallbladder, easily demonstrated, involving also the liver, the common duct, and the pancreas. Similarly, when we examine the small pieces of liver, as we have done repeatedly—from cases of appendicitis, for example—in which there has been no evidence of cholecystitis clinically, we can find microscopic evidence of inflammation within the liver.

A further observation that is very valuable and that bears on this point is the observation made by Meyer and his associates at the University of California about two years ago in a very comprehensive study of the question of typhoid carriers. They took up the question of typhoid cholecystitis along with the typhoid carriers; and they found in their autopsy experience and also in some experimental work on animals, that they never got a cholecystitis unless they had an actual, demonstrable, anatomical lesion in the liver. They go even further and they say that they consider that the typhoid bacillus cannot pass through an unchanged liver. It cannot be secreted, in other words, as bile is secreted or as some other substances can be filtered through the liver. That cannot happen. There must be an actual, demonstrable lesion; then, of course, it is very easy to assume that that actual, demonstrable infection will travel by way of the lymphatics; and it will of necessity therefore strike the gall-bladder and set up an inflammation there, if the inflammation is sufficiently virulent.

Some of this, of course, is old stuff, and we are all familiar with it. I do not wish to go into it in much detail here this morning, but merely mention it as it has a bearing on certain remarks which I wish to make a little later.

We do not assume, of course, that every case of cholecystitis is to be explained on the basis of a lymphatic infection from a previous existence of a hepatitis. We merely wish to call attention to the fact that this is a possible route of infection and that it may explain many cases. When we bear this possibility in mind it may serve to explain many results which we get, much of the rationale of the therapy. When we recall this picture of the lymphatics, for instance, we find this intimate anastomosis

between the liver and the gallbladder; and we find when we subject it to experimentation—that is, by direct injection of the lymphatics—that we can make the stream go either way. We can make the lymphatics of the gallbladder distend when we inject the liver with a substance like Prussian-blue, or we can make the lymphatics of the liver distend when we inject the gallbladder with Prussian-blue.

There is therefore a vicious circle which is established and must be confronted in cases of cholecystitis. As long as the gallbladder remains infected it must be constantly reinfecting the liver. We cannot, of course, from a therapeutic standpoint, break this circle by direct attack on the liver; but we can break the circle by direct attack on the gallbladder. If we grant that the majority of cases of cholecystitis are interstitial in type, and are not confined to the mucous membrane, then the only way by which we can hope to break up this vicious circle is to remove that part which is capable of being removed; and that, of course, is the gallbladder itself and nothing else. Clinically, I think the results speak for the rationale of this explanation, for cases in which the gallbladder is removed certainly get along better than cases in which it has not been removed, in the vast majority of cases.

Dr. Ritchie spoke of the value of the removal of a piece of liver at the time of operation from the standpoint of diagnosis. I am very glad that he feels as he does about this, because it has been my practice for a number of years to do this as a routine, except in cases in which great haste was desired or something of that sort. I would supplement his remarks by saying that I think it gives much information also as regards the prognosis of the case, because it has been our experience that where we find marked changes in the liver the patient is less likely to make a good, permanent recovery than is the case where the lesion in the liver is less. Furthermore, it throws an important light often on doubtful cases. This may be forcibly illustrated by an instance which happened to me only last week:

A middle-aged colored woman came into the out-patient department, acutely ill with nausea and vomiting, complaining of great pain and tenderness in the right upper quadrant of the abdomen. She was intensely jaundiced. In spite of the fact that she was a very black colored woman, her friends had noticed that her eyes were very yellow; and they had commented on the fact. Her urine showed a large amount of bile and also contained a considerable amount of albumin. She had a moderate amount of fever and a slight leucocytosis. We admitted her to the hospital. She was a rather fleshy sort of woman and it was difficult to palpate her satisfactorily; but we could make out a marked tenderness in the region of the liver. This was the first severe attack of this sort that she had had, though she gave a history of having had dyspepsia and indigestion over a period of many years. We felt that the diagnosis probably lay between a stone in the common duct and a marked inflammation of the liver, possibly syphilitic. We did not feel that malignancy was much to be considered, because of the acuteness of the onset and the marked symptoms which she presented. She gave a positive Wassermann reaction but because of her intense jaundice we did not know how much weight to place on that. We decided that the best thing to do for her was to put her in bed in the hospital for a while and wait to see if her jaundice would not clear up a little and then get at her a little more vigorously with the intention of an exploratory operation to see if she did not have a stone in the common duct.

That plan was carried out and she improved from day to day very markedly. After ten days in the hospital her jaundice was almost completely gone; her vomiting had ceased; her temperature had come down to normal; and she was very greatly improved in every respect. Her Wassermann was still positive, but because we find in St. Louis that many of the negroes have positive Wassermanns we do not place the same significance on it that we do in white people. We advised exploration and carried it out. We found a perfectly normal looking gallbladder, normal color, no adhesions, nothing to be felt in it. We put our finger in the foramen of Winslow, palpated the common duct as far as we could and felt nothing. We examined the liver and found that there was considerable difficulty in seeing the liver because it was very small. It was only about half the size of the normal liver, I should say. She had a contour such that it was difficult to see the liver as well as we should like to have been able to see it. When we put our hand up over it, however, we were impressed with the small size of this liver. We were impressed also with the fact that instead of having much thickening, much fibrous tissue in it, it was everywhere soft, edematous. What did that mean? Obviously, here was a case in which the liver was atrophied, without cirrhosis, in a woman with jaundice; that could mean only one thing—at least we so interpreted it—that she had an acute yellow atrophy of the liver which was improving. We took out a piece of the liver for confirmation, and the microscopic examination of this liver showed a typical picture of acute yellow atrophy of the liver which was healing. There was still some necrosis left in the lobules; but there was marked regeneration of liver tissue everywhere. So undoubtedly this was a case of acute yellow atrophy which was healing and which we were able to confirm absolutely by removal of a small piece of the liver tissue, without any deleterious effects on her; at least, she has continued to improve steadily ever since.

It is of interest that when we came to examine her more closely we got some additional history which we did not get before; namely, that she had had an injection of salvarsan elsewhere two weeks before she presented herself at the hospital; and that this attack of nausea and vomiting and jaundice began twenty-four hours after the salvarsan* injection. So I think we were dealing then with a perfectly typical instance of an acute yellow atrophy of the liver induced by salvarsan, very similar to what one gets with phosphorus poisoning, chloroform poisoning, and various other things. It would not have done her a particle of good to have removed that gallbladder, of course, because the gallbladder was not at fault. It had nothing whatever to do with her condition. We made the diagnosis from the appearance of the liver and confirmed it by removal of a small piece.

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*I do not know what preparation of salvarsan was used, whether a German or American preparation.

I might go on and elaborate other instances here similar to that; but it would only take up time and not be particularly instructive. I am afraid I am exceeding my time somewhat, but there is one other thing which I do wish to mention briefly and that is: If we think of cholecystitis and its complications as a disease which very often begins in the portal system and then involves the liver secondarily to make a hepatitis, it behooves us, of course, in every case of cholecystitis to examine the portal system very carefully for a lesion. In my own practice I do almost as a routine perform an appendectomy on these cases because I feel that the majority of cases of cholecystitis probably have their origin in the appendix. This may be only an opinion which will not be confirmed; but it is a very simple matter, of course, to take out the appendix in the ordinary case of cholecystectomy and I see no reason why it should not be done.

PRESIDENT JUDD (Rochester): I did not hear all of the symposium but I had the opportunity to hear the last part of it, and want to say that I have been very much interested in Dr. Graham's work for a number of years,—since the time that he took up the study of the etiology and source of infection in cases of cholecystitis. At the American Medical Association meeting last spring, I reported a group of 24 cases which I believe have some clinical bearing on the experimental work that Dr. Graham has been carrying out. These patients had all had a cholecystectomy for cholecystitis, but had had a continuation or a recurrence of their symptoms, varying from three months to seven years after cholecystectomy; of course, the late cases had not had time to clear up.

The most common cause of a continuation or recurrence of symptoms after removal of the gallbladder, in our experience, has been either overlooked stone in the common duct or calculi which formed after the cholecystectomy. And we have operated upon many cases with exactly the same clinical picture and found stones in the common duct. The twenty-four cases that I mention stand out because, without stones they gave exactly the same clinical syndrome, and make it difficult to explain the cause of the trouble. In each instance the common duct was opened and the probe apparently passed freely into the duodenum, and in spite of a most thorough investigation, we were unable to find an explanation for this continuance or recurrence of symptoms. In each instance we put a Mayo-Robson drain in the hepatic duct and drained all of the bile in this way for about three weeks; and the interesting point is that seventeen of the twenty-four cases were apparently permanently relieved.

I do not know that our interpretation of this series of cases is correct, but I call attention to it in connection with the work which Dr. Graham has done, as pointing to the fact that we are dealing with something besides cholecystitis in these instances; that is, a persisting infection. We believe that the cause of the continuation or recurrence of symptoms was the infection that remained in the liver or pancreas after the gallbladder had been removed; and that secondary drainage of the common duct apparently permanently relieved two-thirds of the cases. Of course, this may be rather far-fetched. I do not know that we have enough evidence to warrant a decision, but this seems to be a series of cases that clinically might bear out some of the experimental work that Dr. Graham has done.

DR. A. T. MANN (Minneapolis): I have been very greatly interested in the papers and especially in the work which Dr. Graham has been doing for some years and which he has brought so nicely before us. While I was doing work on returned soldiers we came to a group of cases in which a diagnosis had not been made or in which we thought a wrong diagnosis had been made. Of these cases we looked over more than 250, and in deciding the diagnosis of the first of them we had considerable difficulty. Some of them had had a diagnosis made of ulcer of the duodenum, ulcer of the stomach—none of them of gallbladder—some of them of chronic appendicitis; some of them of epigastric hernia. We selected a few of the most characteristic of the cases which had been very thoroughly studied by test meals and by the *x*-ray and physical findings. Some of these cases had been under one or more courses of treatment in the hospital for ulcer of the duodenum.

We found in the first place that many of them had the high hydrochloric acid curve. We noted a difference between the high hydrochloric acid curve in these cases and in those of actual, demonstrated ulcer cases. In these specimens, taken every fifteen minutes after a test meal, the hydrochloric acid in both of them rose soon after the meal, so that by an hour, half an hour or two hours after the meal the hydrochloric acid content reached its maximum. However, in the cases of actual ulcer it would continue with more or less variation until the next meal, when it would drop. In these cases it had reached the maximum and would go down and be down before the next meal. So there is a difference in the hydrochloric acid curve.

The *x*-ray findings were largely interesting because of their negative type to disprove the presence of ulcer, of adhesions, and of things of that sort. A few of these cases presented a little tenderness over the gallbladder and we decided that we would do an exploratory operation on the first one. We found a decidedly diseased gallbladder. Encouraged by this, we looked over another series of about twenty. In making our diagnosis sometimes it would lead one way and sometimes another; so that in order to get some working basis we made our diagnosis in percentages. We would make a diagnosis, for instance, in one case of 75 per cent gallbladder, 50 per cent chronic appendicitis, 5 or 10 per cent of ulcer—just to keep it in the field. To make a long story short, we have run through about sixty of these cases in the operating room, and not one of these cases in which the diagnosis of cholecystitis has been 50 per cent or more has failed to show the chronic cholecystitis. We have taken a great many specimens of liver—we do that practically as a routine—and in many of these cases the liver shows such gross changes that it is very distinct to the eye. In a few of the cases the changes were not apparent to the eye but were evident under the microscope.

DR. EDWARD EVANS (La Crosse, Wis.): I have been in the field of diagnosis of gallbladder disease for a very long time and subsequent operative work, having done my first

operation for gallstones in 1891. I was impressed today by two things: first, by the paper of Dr. Schneider on diagnosis, because in that paper he urged on us the great importance of clinical history and taking into consideration the whole patient, not alone the digestive system. It shows what a great advance has been made in gallbladder diagnosis and surgery. In the early days we operated only on definite cases of cholelithiasis. Now, fortunately, surgery has gone back a couple of decades and gets those patients when they can be cured—often before gallstones are formed.

The other thing that impressed me was the charming and illuminating demonstration made by Dr. Graham, putting the surgery of the gallbladder apparently on a definite, accurate, scientific basis.

Dr. Theo. Bratrud (Warren): There is just one thing I would like to make a remark about. That is this controversy regarding the closure of the cholecystectomy or whether it should be drained. I closed several and had a very nice convalescence; but after doing about twelve or fifteen I had two cases that did not do so well and I had to reopen the abdomen and drain and did not lose the patients. Some time ago I was in Cleveland and I noticed Crile closing his cholecystectomies. A few months later I noticed he was putting in a little rubber drain. When I asked him why, he said that he had some fifty of these cases without drainage that did very nicely, but he lost one that he thought he would not have lost if he had drained that wound. I have seen several men who took up the closure of cholecystectomy wound, who thought it was a very nice thing for a short time; but after practicing that method for some time they changed their minds. Should my gallbladder have to come out would want a drain to the end of the cystic ducts.

Dr. A. MacLaren (St. Paul): There are many interesting features in this discussion and I agree with Dr. Graham's suggestion—that it is hard to know where to start. Dr. Bissell has presented a number of slides showing the depression in the duodenal cap produced by a distended gallbladder. My experience is, that the distended gallbladder is the easiest type to diagnose. I have seen a number of single radiograms showing a depression of the cap but no clinical examination gave the feel of a distended gallbladder. My personal belief in these cases is that the roentgenologist "was working his imagination." A radiogram is only a snapshot; if you have a number of these snapshots a sort of a moving picture or the fluoroscopic screen, and find the outside depression remains, then your diagnosis is practically safe. Stones are more frequently shown with us since using the Potter-Bucky Diaphragm. When you know the stones are there, but cannot demonstrate them with the ordinary *x*-ray technique, the use of the diaphragm will many times show the gallstones in an unmistakable manner. I think we are generally coming to the conclusion, in the acute gallbladder, that there is a certain type, a very virulent form of cholecystitis that ought not to be removed. If a removal is made and a raw surface under the liver is left, apparently, the absorption directly into the circulation is very rapid and the patient goes to pieces and dies very quickly. Dr. Farr has helped us with our local anesthesia. This type of case —especially the very sick ones—can be opened and drained under local anesthesia in a very satisfactory way.

Dr. J. P. Schneider (Minneapolis): I would like to make a little closing remark. Seven or eight years ago, when we were studying rather fully the question of the spleen and its pathology and the possibility of attacking it surgically, I made the statement that there were certain types of patients with pernicious anemia in whom splenectomy was the proper thing. The result was that a great many spleens were removed by surgeons in their enthusiasm, on the strength of that statement. Now the same question is going to come up with relation to cholecystectomy.

If we are correct in our conception of pathology and its development, what we must do is to operate the gallbladder earlier; but there is danger that every patient with a pain in the right hypochondrium will be subjected to cholecystectomy. I therefore again make a plea for a comprehensive study of these patients. I think it is the only thing, because again and again the surgeon will dismiss one of these cases as a cured case whereas they really are not cured. Half our troubles with these patients is that they are never well again afterward; and they could have been well in all probability if a great deal of the advance pathology could have been attended to ten years earlier.

With reference to Dr. Graham's work on the lymphatics, if we will bear in mind the work done by Boyd lately and read that in conjunction with his, I think we will get at least a very novel idea of how gallstones are actually formed. Dr. Boyd has shown that there are a great many so-called "strawberry" gallbladders which the surgeon cannot see with the naked eye. There again I bring another plea; namely, that the internist who has studied the patient be at the table when the surgeon operates; because many times a surgeon cannot determine whether the gallbladder ought to be removed; and the determination will depend upon the knowledge of the internist of the entire patient at the time.

Dr. R. E. Farr (Minneapolis): I feel a good deal as the little boy did when the farmer advertised for help. A number of fellows lined up and the farmer inquired what each one could do. One fellow could pitch more hay and husk more corn and so on; someone else could do some other thing better than anyone else. By the time he reached the little boy, they had covered the whole field of activities on the farm; and the little boy said: "There isn't a dam thing left for me to do!"

I just want to compliment the essayists on the many points brought out. I think Dr. Schneider has given us a very comprehensive review of the diagnostic points that we must have in mind. I believe that if we had more internists making the suggestions that he has made here today, and if these were really carried out, we would have a much better opportunity to operate upon these patients earlier. That is very important.

With regard to the operative technic I have very definite and decided convictions. As long as the scientific discus-

sion has covered the fundamentals we might as well spend just a moment upon the superficial things, to remove the necessity for heavy thinking that we have been going through. I believe that the incision for gallbladder work should be adequate; that is, we should have exposure, and that we should traumatize the tissues less than we have in the past in carrying out the operation. It seems to me that the surgery of the future will demand this. Whether the appendix should be removed or not is a question. Personally, I would rather favor doing only the one operation unless the appendix has shown evidence clinically of being diseased. We believe in removing the gallbladder fundus first, attacking the part of it that presents. We believe in upending the liver, rotating it *inside* of the abdomen rather than lifting it *out* upon the chest. We believe in leaving a large amount of the gallbladder peritoneum and in using the very finest material for ligating the cystic duct. Although we have not a large percentage of cases where we have not instituted drainage, we have no case in which we left out drainage that gave us any trouble. The results were better in those cases; the postoperative convalescence was more smooth than in the cases where we drained.

I believe that there is something in Richter's teaching with regard to this matter. Personally, I do not see why we should drain after cholecystectomy any more than we should after appendectomy; although I believe today I might want drainage put in if my gallbladder were removed. Still, I think the difficulty is that we do not know just how to handle the tissues. As soon as we learn to take care of the tissues—say, for instance, as Richter does—I do not believe we will be draining many gallbladders after removal in the interval stage.

Dr. Frank Bissell, Minneapolis: I merely wish to restate and emphasize one or two points made in my paper, and to answer Dr. MacLaren's criticism. While the *x*-ray examination does not at the present time hold a major position in the diagnosis of gallbladder disease, it does nevertheless have a place of considerable importance. Dr. MacLaren says that cases showing duodenal depressions, as illustrated by the slides, are easily diagnosed by palpation or other clinical methods, since the gallbladders are always large. This is not necessarily true, since the ability to indent the heavier filled duodenum seems to result from a thickening of the bladder wall, with its resultant loss of resiliency, rather than from actual enlargement. It is true that such depressions occur only in exceptional cases. They are chosen for lantern slide illustrations simply because they are outstanding characteristics and will reproduce, whereas the faint but more frequent gallbladder shadows will not. Certainly it has not been my observation that cases which lend themselves to *x*-ray diagnosis are easily recognized by other means. Most of the cases included in my series have been picked up in the course of routine *x*-ray examinations for suspected gastro-intestinal lesions. The important thing is to evaluate properly each roentgenological sign of gallbladder disease, and then consider it in conjunction with clinical evidence. It is surprising how frequently one is able to demonstrate the pathological gallbladder in the roentgenogram if he makes a sincere and painstaking effort to do so.

Dr. Harry P. Ritchie (St. Paul): If we interpret surgical diagnosis to mean a review of the gallbladder area as to the degree and kind of disease present, then this study is really the critical situation in the treatment of the individual case. The evidence and the suggestions of the internists indicate that we should anticipate our usual operations by ten or more years. We will surely increase the number of border line cases where it will be difficult to determine not only the degree, but whether the gallbladder is affected. Therefore, I think that we should take into consideration all of these wonderful presentations made here because it is a newer field of diagnosis and thus prepare ourselves for the future. I do not want it understood that I have as a form removed a piece of the liver for examination, but believe it proper to do so, as I have never seen a penalty for so doing.

Dr. Arnold Schwyzer (St. Paul): I should like to use the last few minutes by showing a few lantern slides just to demonstrate a little thing. It may be a little improvement that might help some under difficult conditions where you have a very jaundiced patient—say a carcinomatous case—and you want to do a cholecystenterostomy. For instance, I have a patient at the hospital now. He had always been well, but three weeks before he came he had an acute attack of pain and became jaundiced; so that the history looked entirely as though it was a stone in the common duct. He was an elderly man and he had a very large gallbladder. We left the diagnosis open, whether it was a stone or carcinoma. It came on in a deceptive way. When we went in, he had such a large gallbladder, so tense, that nothing could be done unless we first tapped that gallbladder. After that gallbladder was tapped we found there was not a stone, but a carcinoma. Now we had an open gallbladder and the suture would not hold with that pressure back in the gallbladder. For that reason something had to be done. We thought if we only made a cholecystostomy the patient would lose so much body fluid that we would really have gained nothing, though we would have relieved the itching. We would have relieved the patient's mind by giving him some wrong hope; but we would not have done any real good. First, two catgut sutures were uniting the duodenum to the gallbladder of a distance of one inch. We then inserted a metal rod into the troicart opening and used this as a splint for the cholecysto-duodenostomy. The mucosa was nicked over the tip of the rod and a small opening was made into the duodenum. The metal rod was quickly pushed into it and thus plugged the opening and prevented leaking. No clamps were needed. The two catgut sutures were then whipped over the middle portion of the gallbladder. A catheter then replaced the metal rod, which had been useful in holding the parts well fixed and presented and which had plugged the openings against leaking.

Dr. Evarts A. Graham (St. Louis), closing: I have nothing to add, Mr. Chairman, except to say that I think this is the most interesting symposium on gallbladder disease that I have ever attended. I wish to extend my compliments to the essayists who have presented these very interesting papers.

RECURRENT ULCER OF THE STOMACH AND DUODENUM: CLINICAL NOTES ON INCIDENCE, DIAGNOSIS AND ETIOLOGY*

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Recurrent or secondary ulcer of the stomach or duodenum is one of the most interesting, as well as the most unusual, complications following operation for benign gastroduodenal lesions. In a previous article[1] I discussed the delayed or late sequelae in which the recurring symptoms are usually painful, and identical with or similar to the symptoms for which the patient originally sought relief. The four main underlying causes, especially after gastro-enterostomy, are, in order of frequency, reactivity in the original partly healed or unhealed ulcer, gastrojejunal or anastomotic ulcer, the formation of a new or recurrent ulcer in the stomach or duodenum, and carcinomatous changes in gastric ulcer. These four possibilities must be borne in mind by diagnostician and surgeon in cases in which there is a recurrence of distressing or painful gastric symptoms, usually months or years after operation.

During a period of seventeen years (from 1905 to 1922 inclusive), thirty-seven patients with recurrent gastric or duodenal ulcer were examined in the Mayo Clinic, for thirty-three of whom a second operation was performed. Nine of these patients were females. During this time approximately 7,000 operations for chronic gastroduodenal ulcer were performed. Obviously this complication is relatively rare. Four patients with characteristic syndromes, confirmed by the roentgen ray, were treated medically. A diagnosis of recurrent ulcer was made in a number of other patients but they did not remain for treatment. The cases were classified in three groups: (1) eight cases in which gastric ulcer had apparently developed after successful gastro-enterostomy for duodenal ulcer; (2) eighteen cases in which gastric ulcer had recurred following primary operation for gastric ulcer, and (3) eleven cases of duodenal ulcer recurring after operation for duodenal ulcer.

Group 1.—The type of case in this group is of especial interest to surgeon, internist and bacteriologist. The appearance of an apparently new gastric ulcer in the presence of a normal functioning gastrojejunostomy admits of considerable speculation. I have reported[2] one such case in which the gastric ulcer was active, benign, and penetrating in spite of good motor function, the persistent absence of free hydrochloric acid, and a healed duodenal ulcer, as shown at the second operation. The ulcer may have existed at the time of the original operation and been overlooked by the surgeon; in fact it would be difficult convincingly to disprove such a contention. In 6 per cent of cases of duodenal ulcer, according to our surgical statistics, chronic gastric ulcer is associated. Moreover, chronic benign ulcers of the lesser curvature, above the incisura, may occasionally persist and even rarely progress to hour-glass deformity after successful gastrojejunostomy. This fact, and the potentiality for malignant transformation or hemorrhage have made it necessary routinely to remove such ulcers by cautery or knife. But it might be argued that the ulcer most probably did not exist at the time of the original operation, since an experienced surgeon or a competent roentgenologist could hardly overlook a chronic calloused lesion, usually associated with a crater formation in the stomach. Following the primary operation, the eight patients in this group had periods of complete relief, varying from three months to eleven years. Five of them, however, had a postoperative recurrence of symptoms within an average period of nine months. As one would expect following gastro-enterostomy, the acidity of the gastric contents, and motility were within normal limits, except in two patients who had coincident ulceration at the stoma. Six of the patients, including the two just mentioned, had evidence of marked focal infection in teeth and tonsils, especially the teeth.

Group 2.—There were eighteen patients in this group. Eight, including those who experienced no relief after the original operation, had a recurrence of symptoms within a year. Seven, however, had complete relief for from three to five years. In contrast to the patients in Group 1, however, increase in gastric secretion and titer, and impaired motor function were much more pronounced. In two instances gastrojejunal ulcer was associated. A recurrence of the ulcer at the site, or in the scar, of the original lesion was frequently noted by the

*Read at the Minnesota State Medical Association, St. Paul, October 11, 1923.

surgeon. Accurate records of the condition of the teeth and tonsils were obtained in fifteen of the eighteen cases. In thirteen there was advanced periapical disease, some pyorrhea, or tonsillar sepsis, or variable combinations of such foci. The primary ulcer was excised or resected in all, excision alone was performed in five, and excision, with some form of plastic operation, was performed in six. Gastro-enterostomy, with or without excision, was performed in six cases, in two of which there was an anastomotic ulcer besides the recurrent ulcer.

Group 3.—The eleven patients in this group who had duodenal ulcer that recurred after operation, had clinical features similar to those in the cases in Group 2. Excision was performed with or without an associated plastic operation in eight cases, and in three gastrojejunostomy; one of these patients also had a recurring gastrojejunal ulcer. Five of the eleven patients had a recurrence of symptoms within one year after operation, two of whom experienced no relief. Two had complete relief for four and five years, respectively, the latter having had simple excision. Hyperacidity was present in all; in six there was definite retention and hypersecretion, five of whom had had an excision, with or without a plastic operation. Since nineteen of twenty-nine patients in Groups 1 and 2 (65 per cent) had had excisions, it may be inferred that the plastic type of operation occasionally invites local recurrence with the associated gastric secretory and motor derangement, but it does obviate the possibility of an anastomotic or jejunal ulceration. I have shown[3] that the odds are still in favor of the patient who has had gastrojejunostomy.

SYMPTOMS AND DIAGNOSIS

With few exceptions, the symptoms engendered by the recurrent lesions were identical with those of the original complaint, having the familiar characteristics of an ulcer syndrome. Two patients with gastro-enteric hemorrhage without the associated ulcer type of pain or distress had secondary operations, when new or recurrent lesions were discovered. In fact, hemorrhages occurring as a new phenomenon in ulcer-bearing patients some time after operation are invariably the result of a new ulcerative process, acute or chronic, and if of the latter type, are situated either at or beyond the anastomosis, if there is one, or in some other portion of the viscus. The diagnosis or recognition of these secondary lesions is not so difficult as formerly, thanks to the invaluable aid afforded by the roentgen ray and the proper interpretation of findings by the experienced roentgenologist. While the clinical evidence for an active ulcer may be conclusive, this often may be rightly interpreted as reactivation of the primary ulcer, particularly in the large group of duodenal ulcers, for which gastro-enterostomy has been performed. Moreover, localization of a new ulcerative process can only be determined, as a rule, preoperatively by means of the fluoroscope and roentgenogram, or at operation by the exploring fingers of the surgeon. With two exceptions the roentgen evidence concerning the patients in Groups 2 and 3 was quite decisive. In Group 3 (the series of cases of recurring duodenal ulcer) much depended on the purely clinical data, because a deformed duodenal bulb usually persists after complete healing of the ulcer, or it may be the result of the surgical procedure. It is obvious that criteria other than roentgenologic were necessary in this group in order to reach a proper diagnosis, and to institute rational treatment. W. J. Mayo, a number of years ago, and Judd, more recently, have emphasized the fact that contact or multiple ulcers of the duodenum are common, and that those on the posterior wall may be overlooked. This possibility must be borne in mind in such cases if symptoms are persistent or recurrent.

CAUSAL FACTORS

The question naturally arises, what are the predisposing and causative factors of recurring ulceration of the gastroduodenal mucosa, and may not these cases afford new or additional evidence concerning the etiologic factors in the formation of ulcer? The theory that infection is the cause of ulcer is admittedly the only tenable one at this stage of medical progress. Corroborative clinical data indicating causal relationship between foci of infection and systemic disease are not lacking. This is as true of diseases of the gastro-intestinal tract, as of those of the endocardium, kidneys and joints. The seasonal incidence of exacerbations or onset of a primary attack of peptic ulcer occurs during the months when tonsillitis, sinusitis and respiratory affections are most prevalent. Fatigue, chill, exposure and so forth are predisposing factors, when the resistance of the host is temporarily lowered. Symptoms of ulcer sometimes first be-

come manifest within several weeks or months after devitalization of teeth. Exacerbations of the ulcer are coincident with extraction of infected teeth or tonsils, or with exacerbation of infections in these structures themselves. The epidemics of influenza have been followed by a marked increase in inflammatory lesions of the digestive tract, including the biliary apparatus, pancreas and appendix, or by an aggravation of symptoms in organs involved prior to the epidemic. This may be explained by factors inherent to this infection, or more probably by the influence of existing foci, due to the coincident lowered resistance of the individual. The radical removal of all possible foci has repeatedly caused subsidence of gastro-intestinal disturbances, and evidence of increased healing of an otherwise refractory ulcer. Persistent gastric malfunction without demonstrable local lesions has ceased after removal of septic or abscessed tonsils, or devitalized teeth with periapical disease, or after drainage and treatment of a suppurating sinus. Suppurative gingivitis, the result of extensive pyorrhea, provokes an infectious gastritis, and if not taken care of in time, may result in permanent damage to the gastric glandular tissues. On the other hand, infection that is sealed in, and under tension undoubtedly produces embolic focal lesions of the digestive tract through the blood stream. In all of the patients in this series possible intra-abdominal foci, especially in the gallbladder and appendix, were removed at the primary operation. The records were complete as regards foci in teeth, tonsils, sinuses, prostate, adnexa, and so forth, in all but five patients. Twenty-nine of the remaining thirty-two harbored extensive foci, especially in the teeth or tonsils, or both; this fact appears to be more than a mere coincidence.

Rosenow's researches seem to prove that many, if not all, ulcers of the stomach of man and of domestic animals, are associated with a streptococcal infection in the ulcerated area, that foci of infection, such as the tonsils and teeth, harbor the streptococcus and predispose to ulcer and that, when isolated from the ulcer and from the distant focus, the streptococcus has elective affinity for the stomach, producing hemorrhage and ulcer on intravenous injection. Rosenow has recently maintained specific infecting power and specific immunologic properties in the streptococcus isolated. From time to time I have referred patients to him for bacteriologic study, who had active lesions and foci suspected of causal relationship. The findings have almost invariably been positive, so far as the elective localizing power of bacteria was concerned. Such investigations will be continued as circumstances permit, in order to obtain data with regard to the causal relationship between focal infection and systemic disease. Thus far patients with primary ulcer, recurring hemorrhage, secondary and anastomotic ulcer, achylia associated with low-grade pancreatitis and cholecystitis, have been investigated, with results apparently proving the causal relationship of parasite and disease, and the striking improvement in the health of the patient following thorough and proper removal of all foci.[4, 5, 8]

ILLUSTRATIVE CASE

Case A346832. Mr. J. H. C. Posterior gastrojejunostomy for duodenal ulcer on the anterior wall, and appendectomy were performed June 21, 1921. The stomach was somewhat dilated; exploration of the gallbladder, ducts, liver and pancreas was negative. The patient was completely relieved for one and one-half years, when there was a recurrence of similar symptoms.

Definite foci in teeth and tonsils had been found at the first examination but the advice to have them removed had not been followed. Tenderness was noted in the epigastrium. Gastric analysis revealed total aciditv 42 per cent, free hydrochloric acid 30, and filtrate 350 c.c. Roentgenograms revealed an ulcer on the lesser curvature, deformed cap, the "gastro-enterostomy not free", signifying probable early gastrojejunal ulcer.

Fig. 1. **a** and **c**, ulcer of the stomach in rabbits following intravenous inoculation of the freshly isolated culture of the streptococcus from the tonsil in the case of recurring ulcer, and **b**, the corresponding filtrate. Note the marked necrotic margins of well-formed ulcers near the cardiac orifice following injection of the living culture and the hemorrhagic ulcer near the pylorus following injection of the filtrate.

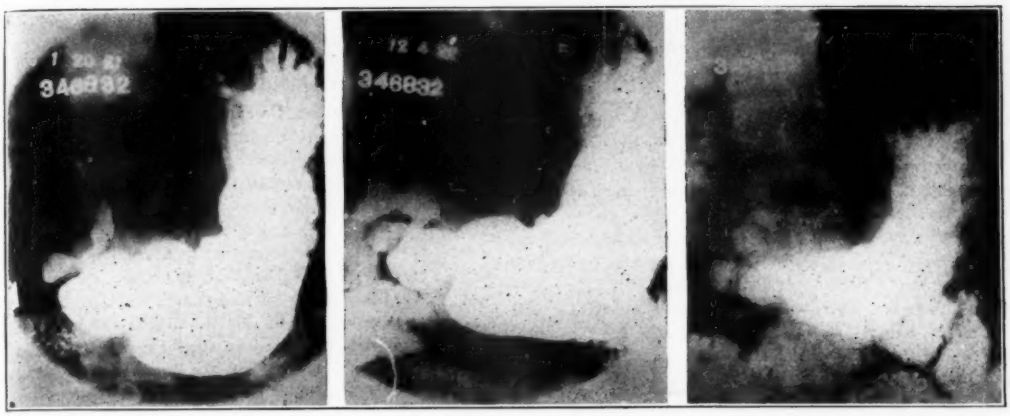

Fig. 2. (Case A346832.) January 20, 1922. The stomach before operation. Diagnosis: Duodenal ulcer. Characteristic deformity of duodenal cap.

December 4, 1922. Ulcer on lesser curvature, body of stomach. Cap deformed; gastro-enterostomy not free.

January 11, 1923. Stomach negative. Gastro-enterostomy free. Reray July 9, 1923. Stomach negative, gastro-enterostomy free.

The tonsils, from which pus was freely expressed, and four pulpless teeth with well-marked areas of rarefaction around their apices, were removed at four sittings. Ulcer was produced in animals after the injection of minute doses of suspensions of pus expressed from the tonsils, and also after the injection of the primary culture, and a series of the secondary cultures. Identical results were obtained by Meisser and Nakamura following the injection into animals of cultures from the patient's teeth. In thirty-seven of forty-four animals (84 per cent) the results were positive, hemorrhage or ulcer of the stomach being found (Fig. 1). Coincidental with the removal of the foci of infection, and medical management of the ulcer, the patient's symptoms subsided and there was marked evidence of healing (Fig. 2). The patient has remained well since.

PREVENTIVE TREATMENT

Prevention is more effective than treatment for recurrent ulcers. In the patients in Group 1 the formation of secondary lesions seems to prove the influence of distant foci of infection. Those in Groups 2 and 3 demonstrate that the operative field, in a certain percentage of cases, is a point of least resistance which may be unfavorably influenced by irritant factors until healing is complete. The part focal infection plays in such cases is still a moot question and, I believe, demands further investigation. There is a third type of case in which there is a tendency toward recurrence, in some instances repeated, over a short period. The Hebrew and the person with a hyperirritable nervous system who smokes excessively are illustrative of this type. Whether nervousness and tobacco are direct or only predisposing causes remains to be proved. Moynihan has recently called attention to the fact that smoking is one of the most harmful habits for ulcer-bearing patients; that an "attack" of duodenal ulcer often follows an orgy of tobacco, and that abstinence may check such an attack. I have noted repeatedly that patients, especially young adults, with distressing epigastric complaints simulating ulcer, are permanently relieved by eliminating tobacco. In this connection it has been observed occasionally that a drinking bout may predispose to recurring gastric hemorrhage years after the patient has been restored to health by an operation. Rosenow is convinced that an ulcer which remains is not in itself a source of future trouble, chiefly because the organisms present are invariably few in number.

From the foregoing, it is reasonable to conclude that the removal of all demonstrable and suspected foci, and the avoidance of all predisposing causes are essential for the prevention of recurrences and for the production of permanent cure in the greater number of cases. Among the chief predisposing causes are bulky, indigestible food, hastily and heartily eaten too soon after operation, fatigue, climatic exposure, respiratory infections, and the intemperate use of tobacco, alcohol and condiments.

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DISCUSSION

Dr. Robert L. Rizer: We certainly all appreciated the paper of Dr. Eusterman. There are many points of intense interest. I think the first is from the standpoint of infection as being the chief etiological factor in the production of ulcers. I think it is the chief etiological factor in the cause of recurrent ulcers and explains why we have a recurrence in the disturbance. It has been definitely established from researches and the work of Dr. Rosenow and Dr. Eusterman in collaboration, that infection has produced ulcers in animals, where the recurrence has taken place. The removal of the infection foci has in our experience limited recurrence. The animal experiments have borne this out.

We do not see as many of the great deep crater ulcers since we have been removing foci of infection. Another point: Our experience with malignant degeneration occurring on gastric ulcer has been very limited. I would like to ask Dr. Eusterman if he would kindly let us know the frequency of developments of malignancy in cases that have been operated upon with gastrostomies or some other procedure. The routine removal of infectious foci, chiefly of tonsils and teeth, has almost ruled out recurrence in our experience.

The occurrence of coincident disease, particularly in the gallbladder, the appendix and the pancreas, in our experience occurred probably in between three and four per cent of cases. They are sometimes difficult to pick out on examination. Those, of course, will act as patent sources of infection and the ulcer symptoms are not relieved until surgical interference is used.

Dr. George B. Eusterman (closing): In answer to Doctor Rizer's question, I would say that we have known of specific instances in twenty-eight cases where gastric ulcers have apparently been transformed into carcinoma from two to seven years after a gastroenterostomy, when the ulcer was not removed at the original operation. Wilson reported nineteen of such cases almost ten years ago. Therefore, it seems reasonable to presume that in a small percentage of cases a gastric ulcer may undergo malignant changes even in the presence of a gastroenterostomy. We know that such ulcers may occasionally become reactivated and even go on to hour-glass deformity or some other complication in spite of a gastroenterostomy; hence the logic of excising such ulcers by knife or cautery at the original operation. Such malignant transformations were found to be situated at or near the site of the original lesions as determined by the roentgenogram or a secondary operation in the cases that again came under our direct observation.

As regards the question raised by Doctor Strickler, undoubtedly infectious conditions in the intestines, because of foci in the upper respiratory tract, probably do obtain. Our knowledge and accumulative data regarding this possibility to date are not very complete. Rehfuss, in a personal communication, described cases of infectious colitis following suppurative sinusitis and other conditions in which he was able to obtain the same variety of streptococcus from the mucous discharges and intestinal lesions which were present in the sinuses; that by cleaning up the original focus of infection and treatment of the bowel condition, patients were cured. Undoubtedly the bulk of intestinal infections, as Adami has pointed out, originate in the intestinal tract itself. Experimentally we have reproduced acute hemorrhagic gastroenteritis by injections of organisms from periapical abscesses, which experiment seemed to explain the clinical history, as such patients frequently gave an early history, with symptoms of acute gastroenteritis, mild or severe in form, gradually being transformed into a chronic condition associated with achylia, which was probably due to loss of glandular function, the result of the former acute process. Frequently there is an associated cholecystitis and pancreatitis in such cases.

ASSOCIATION AND FAIR PLAY*

James D. Denegre
Minnesota State Senator
St. Paul

One of the outstanding tendencies in the complexity of American life of today is association and organization. It is the outcome of national growth and of a multiplicity of religious, industrial, vocational, fraternal and social endeavors.

The grouping of men and of women, too, together

*Address before the Minnesota State Medical Association meeting, St. Paul, October, 1923.

in co-operation and their organized activities constitute a tremendous factor in the development of our institutions and the formation of public sentiment.

The growth of these organized groupings is typical of the American genius—service by association and progress through association. For centuries we have had organized community government in constantly changing forms, and we have had organized morals in the form of the church, but it is only in these later days of great industrial and material growth that there has arisen great organizations of sections of our people with a common understanding and a common purpose. Organized labor, organized business and organized agriculture are recognized forces now in the community along with organized government and organized morals.

It is the group that exerts the larger influence and power in the formation of public opinion; the individual is making himself felt by and through the group with which he is cooperating.

The medical profession is one of the oldest and most honorable of these groupings of men together with a common object and common purpose.

Collectively and individually it has exercised much power and influence and it is still capable of doing so. But I am inclined to agree with Dr. Savage that in the past few decades it has not made the most of these opportunities and in saying this I am not at all unmindful of the marvelous advancement of medical and surgical science and of the wonderful work accomplished by medical men for the alleviation of human pain and suffering and the upbuilding of a stronger and better race. But the trouble is, the public is not informed, is not cognizant of what you have accomplished and are accomplishing and has not been told about it. You have, I think, in the strenuous and exacting demands of your profession, been keeping too much within yourselves.

Let me illustrate this by something concrete. Last winter you appeared before the legislature with a measure known as the Basic Medical Practice Act. Personally I believe that it was a measure which if passed would have made for higher standards in the various schools and agencies for the treatment of human ills. But there was a feeling among the legislators and many of the public that you were trying to shut out the newer cults recognized by law; that you were striking a blow at the under-dog and that you were not playing the game fair. With this sentiment arrayed against you the measure did not pass.

The opposition to the Basic Medical Practice Act was, I think, intensified by the fact that you had been before the legislature on previous occasions seeking or opposing legislation bearing on your profession and of more or less public interest and while your motives were undoubtedly of the very highest, your efforts were interpreted by the rank and file as self-seeking and for the advancement of your own profession. There was a suspicion that you are an autocratic, high-toned, close corporation and that you were generally before us only when you were interested in something of benefit to yourselves and that somehow or other you didn't care much for the little fellow.

I realize full well that this sentiment is not fair and does not do you justice; but it is an existing condition and I think that your friends in the legislature and your own legislative committee will concur with me that I have not overstated it.

While I may not be qualified to suggest a remedy I think that present conditions can be met and in part offset by your profession taking a more active interest collectively and individually in the things outside of your vocational work, in some of the social and political movements, too, that make for a better citizenship and the permanency of our democratic institutions.

I am fearful that many of you and those of other professions including my own have difficulty in finding time to vote. A few years ago after a rather important election, I had to make, on account of a prospective contest, a cursory analysis of the vote in one of the populous residence districts of this city and I could not help but note the absence from the poll list of many men prominent in the professional life of the community. I do not say that this is generally true of members of your profession and that you do not vote, but the point to which I desire to give emphasis is that particularly in our large communities men of education, prominence and standing in both the business and professional world still look down upon politics as something beneath them—unsanitary and unclean, and register and vote only when urged and solicited to do so by some party organization or the friends of a candidate for office.

I believe you want to play the game fair—but the public does not appreciate it. Yours, while a small, is a well-informed and well-educated group and exercises a wide influence and I think that a more active participation in the duties of good citizenship and a wider publicity of what you have done and are doing will go a long way in arraying public sentiment on your side.

One of the compelling issues before the American public today is the issue of State Socialism against Individualism. It is a larger issue than many informed on public affairs will admit. The attention of the public is being drawn to it by the existing discontent in parts of the country, more particularly the agricultural sections of the middle west, although I think that that discontent is somewhat exaggerated by well organized propaganda. As in nearly every case where something goes wrong, the government is being appealed to and men are asking for legislation to amend the economic laws of supply and demand and to fix the price of some of the staple products of the farm.

Many of those who are voicing the present discontent are striving to bring about the operation of public services and even quasi-public services by the state; they are asking for more power for our law-making bodies and less for the courts and are seeking to impose upon us some of the socialistic theories which are proving so disastrous in Europe today.

In the existing discontent and in the demands for legislation to cure our economic ills I think we are losing sight of the true American philosophy which in a phrase may be termed the philosophy of fair play, and which holds the prime function of constituted authority to be that of preserving fair play and equal opportunity for every individual.

This philosophy in providing the field of opportunity and security of reward stimulates the individual to create his own place in the social structure by his character, ability and efforts.

The foundations of this republic were laid by men of courage and ambition rebelling under a social and political autocracy which suppressed the freedom of opportunity known as fair play.

The note which rang true in the Federal Constitutional Convention and in the state conventions was the note of equal rights and opportunities, the note of fair play.

It was not fair play when men lucky in birth and fortune made the selection of administrative officers and the laws under which all must live. Universal suffrage came as a response in our earlier days to the aspirations of fair play.

It is not fair play that organizations of men associated for lawful activities shall stand unequal before the law with exemptions for organizations of labor or organizations of growers. I believe the time will come when these inequalities will be removed because they violate the human sense of fair play.

It is not fair play that organizations of men shall deny the right to work, to men of other views. It is equally clear that public opinion condemns organizations that by force and violence offend the public sense of fair play.

It is not fair play that through unequal or unwise taxation, special sections of our people, numerically strong, shall levy an unfair burden in a spirit of envy and resentment against those other groups more fortunate than themselves. Taxation which destroys the human incentive in the fields of scientific research and discovery and which stifles the willingness to take the risk of new trade and business ventures is unwise as well as a violation of fundamental fair play.

Under conditions of absolute fair play between individuals and organizations, society apportions a sure and fair reward to those who serve best whether in the field of invention, discovery and research or the work of industry and the professions.

It was on the principle of fair play that our government was founded; it was on the same principle that it has developed, prospered and grown and in my judgment it will be by an adherence to that principle rather than to any legislative nostrums that we will find our way out of our present and future troubles.

The thought that I would leave with you is the duty of men of your high intelligence, influence and standing making a stronger impression upon the thought and public sentiment of the day. There are great organizations striving to mold public sentiment which are at work not just before elections but all the time between elections and if the principle of fair play is to be preserved in our government and its institutions, it must be with the coöperation of men of your type and understanding.

The maintenance of this principle is an important concern of yours and mine.

HAS THE MEDICAL PROFESSION LOST THE POSITION IT ONCE HELD IN THE ESTEEM OF THE PUBLIC?*

FRANCIS J. SAVAGE, M.D.
St. Paul

Whether or not the title of this paper be an accurate statement may be argued. During the past session of the legislature, one of our older practitioners, who was active in legislative matters thirty years ago, asked me if I were sufficiently familiar with the legislators to realize that the medical profession did not stand well with them. I had already arrived at the same conclusion, and it would seem as if we must go further back than thirty years to prove our point. However, I think we will all admit that the old-fashioned country doctor who ranked with the minister, the lawyer, and the banker, as a man of education in his community, who was the family counsellor and friend, did hold a position in the public esteem that modern city life almost prohibits.

I think of one of this old school who practiced in a Massachusetts village. He was the first president of the first village improvement association in America. He held the position of president for twenty years. He died in the early eighties, but his memory is perpetuated by a carved rock near one of the paths in the park given to the village by the association: "Dr. ———, born 1804, died 1882. 'The Beloved Physician.'" I have referred to this old-fashioned country doctor as a type of the old school, one who, although he lacked laboratory facilities and the benefit of expert opinion from his specialist friends and had to depend on his own common sense and judgment, did hold a position in the public esteem and had a close personal touch with his families which does not prevail in these days of specialism and clinics. This old family doctor did not know the meaning of commercialism. He sent his bills out once a year and in the summer his wife took boarders to help pay their bills.

Commercialism, fortunately, does not characterize the medical profession; but there are enough examples apparent to everybody to deserve some comment. Some years ago I watched an acquaintance removing a simple, small adolescent colloid goiter from a girl of twenty. I asked him what he was operating for, and he said, "For a hundred dollars." In his case a true answer. Many years ago I did a charity appendectomy on a woman who earned her living by working by the day. She was in the hospital sixteen days and her bill was $16.00. She had but $15.00 and the hospital authorities took her wedding ring as security for the remaining dollar. A domestic earning $18.00 per month in the family of a close friend of mine was charged $350 for a mastoid. The account was settled for $100 of borrowed money. The public does not always recall the amount of time and energy given free by medical men in hospital, dispensary and private work; but the few glaring examples of commercialism such as the above stand out in their memory with such prominence as practically to exclude the other phase. If the welfare of the patient were put first, there would be no complaints along this line.

Is commercialism back of the growth of the cults, or is it due in some degree to the failure of the medical profession? There are approximately 2,200 medical men in Minnesota, and 500 osteopaths and chiropractors—to say nothing of Christian Scientists. These men earn their living through people who believe in them. It sometimes seems in the legislature as if 77 per cent of the legislators were patients of these practitioners rather than 23 per cent. At the recent session of the legislature, the House Committee on Public Health and Hospitals recommended two chiropractic bills which were diametrically opposed to each other in principle. The first provided that the future chiropractor must prepare himself by studying for 4,100 thirty-minute hours (equivalent to 2,460 fifty-minute hours), a course easily completed in one year. The second bill called for four years of nine months each. In other words the legislature wanted to do anything that any chiropractor might ask. The medical profession had a far different reception. When the Basic Medical Practice Act was discussed on the floor of the house three members told what wonderful things the chiropractors had done for them; not a soul had anything of a similar nature to say of the doctor!

In conversation last winter with a prominent chiropractor I asked him if they depended on the *x*-ray for the demonstration of dislocated vertebrae.

*Presented before the Minnesota State Medical Association meeting, St. Paul, October, 1923.

He said, no—that the *x*-ray would show them, but that his fingers were so sensitive that he didn't use or need the *x*-ray evidence. He evidently is able to have his patients dream the same dream.

The osteopath puts in about 4,500 hours of work in preparation as against 10,400 by the graduate in medicine of the University of Minnesota; and yet he is today in Minnesota licensed to administer anesthetics, narcotics and antidotes, in the practice of obstetrics and minor surgery and cases of poisoning. He is not entitled to practice internal medicine or major surgery.

Among the other phases of the analysis of this subject the matter of expert medical testimony deserves consideration. Who is there among us who has not blushed for his profession in listening to so-called expert medical testimony? A physician told me with pride of a case in court when he was to testify on behalf of the plaintiff. The papers had been drawn alleging an injury to the nerves of the leg. When the case was called for trial, this doctor found himself opposed by one of the leading neurologists of the state. He then instructed the attorney for the plaintiff to change the pleadings to show the case to be one of injury to the ligaments. The neurologist was left high and dry; and the proceedings being held many miles in the country and no surgeon being available, the doctor won the plaintiff's case. It is unnecessary to burden you with additional examples. Hennepin County made an effort to correct the disrepute that has fallen upon the medical profession on account of expert medical testimony. The proposal was that each member of the Hennepin County Medical Society who might wish to testify in court should sign a card indicating in what subject he considered himself qualified to act as expert witness. By mutual agreement of opposing counsels three physicians were to be selected who had qualified in the specialty under which the case would fall. This medical jury of three, paid jointly by opposing sides, was to bring in the medical verdict. I understand the procedure has not been popular with the lawyers of Hennepin County. In discussing this with a lawyer, he said he thought the procedure never would be popular with the legal profession because it deprived the lawyer of his prerogative of bringing out all available testimony on cross-examination.

The following paragraph was written by Dr. S. Marx White and is taken from the report of your Committee on Public Policy and Legislation: "Only by a mechanism which will remove the temptation to modify testimony for gain, and make the expert an officer or employee of the court, instead of the litigants, will it be possible, in the opinion of your committee to do away with the many and serious evils of present day medical testimony."

Along the same lines of lack of common honesty come the unjustified medical certificate to avoid jury duty and the whiskey prescription.

A far more serious offense than the lack of common honesty is murder done by the habitual abortionist. This was the subject of discussion by the Committee on Public Health and Hospitals while in executive session in debate on the late lamented Basic Medical Practice Act. It was one of the arguments used in killing our bill. It is not supposed to be, nor is it, the business of the doctor to ferret out the criminal abortionist; it is the business of the county attorneys and the police. But when such statements are made at the state capitol casting a slur on the whole profession, is it not time for us as a society to go a step beyond what we are supposed to do, and in the endeavor to square ourselves in public opinion appropriate a sum of several thousand dollars for the employment of women detectives for obtaining evidence against the criminal abortionists? Would not the knowledge of the existence of such a fund have a deterring influence, and in addition demonstrate to the public that we are doing what we can to wipe out these vipers?

Another phase of our subject is the lack of interest shown by medical men in public affairs and politics. In how many of our communities do you find medical men the leaders in public and civic affairs? St. Paul has the fairly good record of having about thirty doctors as members of the St. Paul Association. This association is back of all new matters in the city that have to do with civic development. As its total membership is 3,600 and there are 419 physicians in the city, 7 per cent of the medical men are members of this civic association. Last winter at a dinner attended by 1,100 people at which the closed shop as a national menace was discussed, there was one doctor present. Medical men have the brains and ability to take their place in the civic life of the community; what is lacking is the inclination. When I discussed

the subject of this paper with one of our state senators he gave it as his opinion that the loss of prestige by the doctor was directly due to his lack of interest in politics. He said that the busy doctor was no busier than the busy lawyer, and yet the doctor was apathetic and the lawyer was active in politics.

In the old days the ministry, law, and medicine had more of a monopoly on higher education than is true today and consequently were held in greater respect.

There are many other phases that might be brought out in the analysis of the subject, but the fact that medical men do not hold the position they should in the estimation of the public has been brought home to me by three years' work on the legislative committee of the State Association.

Admitting the truth of the statement that the doctor has lost standing because of lack of leadership, what are the remedies? Some of the remedies have already been indicated, namely, honesty in court, considering the welfare of the patient of more importance than his fee, wiping out the habitual abortionist, and taking a keener interest in public and civic affairs.

There are two other suggestions I wish to make. The first is a campaign of public education by the entire medical profession of the country emanating from the American Medical Association—through the public press, radio, and moving pictures. The job is too big for any one state.

There is no one agency equal to the public press for the dissemination of facts showing what the medical profession has done in the eradication of epidemics and the control of disease and sanitation. Why should not the American Medical Association employ a staff of writers and arrange for well-written newspaper articles to be broadcasted over the country through the Sunday papers? There are of course difficulties in the way: those who pay the newspaper for advertising Lydia E. Pinkham's Vegetable Compound would undoubtedly withdraw their patronage if they advertised on one page and on the following page were confronted with the formula of this vegetable compound and an article by the editorial newspaper staff of the American Medical Association. The public is entitled to know the facts, and it is up to the medical profession to give them the facts. It is at least worth a mighty effort in the endeavor to get an enlightened public opinion. The medical men of the state of Illinois have raised a sum of $10,000 this year for public educational propaganda. They propose to work through the newspapers, by radio and the lecture platform.

Next in importance to the public press for reaching large numbers of people may be ranked the movies. Imagine short films in all the larger theaters of the country showing the conquest of yellow fever, of typhoid, of diphtheria, and many others. This could be done by the American Medical Association, and if it were started, together with propaganda by radio and through the press, it should be on at least a ten-year basis.

The second remedy I wish to urge, particularly here in our own state, is that medical men as an organization take an active interest in politics. I wish to cite an instance showing their relative importance at the last election for the legislature in Ramsey County. In the Merriam Park district there were two chief candidates running for the house. The one up for reëlection had shown himself antagonistic to the medical profession at the last session of the legislature; his opponent had expressed friendliness toward the medical profession. The committee on legislation of the Ramsey County Medical Society called up fifty voters by telephone and got their pledges to support the second candidate. He won by approximately fifty votes. This man introduced our Basic Practice Act in the house and fought for it to the last ditch. He also fought the osteopathic bill.

There are certain members of both senate and house who by years of voting have demonstrated that they are hostile to regular medicine and will do anything in their power for any quack. These men are often elected by a narrow margin. Why should we not throw a united opposition against these men at election? It is possible to elect men friendly to us; it has been done and should be done at the next election all over the state. I can assure you we need such backers at the capitol. Last year for the first time there were organized committees on legislation in all the principal county medical societies. These committees should continue to function and become more active each year. I can see no objection to their becoming active political factors.

In conclusion, I wish to offer one more suggestion. As the boy is father to the man, so is the

relationship of the medical student to the physician. Do our medical schools, in addition to passing on the mental qualifications of the future physicians, pay enough attention to character? It seems to me this is one of the fundamentals to the future welfare of the practice of medicine.

DISCUSSION

DR. O. C. STRICKLER: I think this paper of Dr. Savage is particularly timely. I think this subject should have been discussed earlier in the day, that is, at the time that we have been discussing questions connected with the relations between the public and the profession. Yesterday I received a communication from a colleague in a neighboring town, stating that he was being sued for malpractice in the case of a fractured arm and asking what he should do. He has insurance. I wrote back and gave him my suggestions, as I had seen the case. I feel that the trouble with the introduction of malpractice suits is due very much to the medical profession itself. In French they say, in detective work: "Hunt the woman." In every case of malpractice that is introduced in this state, as far as I know, the proposition is: "Hunt the doctor." Some doctor is back of every malpractice suit. I am particularly interested in this subject because when malpractice suits are tried we hear medical men and surgeons testify as to the case under question. It is no doubt on account of this that the public has lost to a great extent its appreciation of doctors; that if it is a factor it is on account of the stand that members of the medical profession take in such matters.

Along with a discussion of the paper of Dr. Savage we should also discuss the suggestions made in Dr. Judd's paper. We should endeavor at all times to encourage our medical men to unite with our medical societies, and we should do everything we can to promote harmony. I doubt very much the propriety of the action taken a few years ago when our charter in Brown and Redwood County was revoked on account of some personal opinions held by one of our members. I do not think we will get anywhere with any such action. If it can be shown that a medical man or surgeon is doing anything to encourage malpractice suits or doing anything considered unprofessional he should be spoken with in a kindly way and have the matter rectified.

Personal opinions as to politics or religion should not be discussed in the meetings of our medical societies, they have no proper function there. I am saying this intentionally, kindly and sympathetically, because there are three or four former members in our county that have not reunited with our society. I go to them and speak with them and they bring up personal matters and remain outside of our society. The unfortunate thing is that if we have any bill before the legislature and we ask those gentlemen to assist us in the passage of the bill, either they do not assist us or they work against us.

I received a number of requests from our Legislative Committee stating that I should do what I could with our representatives and senators regarding a certain bill. I went to them. They asked me: "Does this bill receive the support of the medical profession?" I said: "Yes." "Does it receive the support of the State Medical Association?" I said: "Certainly." One of the gentlemen said: "Then I will do everything I can against it," and he gave as his reason some action taken by this Association in regard to one of our members. I told him that was not the stand to take, that every question ought to stand on its own merits.

If we work together and get in those six hundred or a thousand men that are not members of our Association and talk over matters fairly and kindly I believe we could pass a reasonable law. The older members of this Association will no doubt remember H. A. Tomlinson's suggestion that all medical practitioners in the state should come under one law and that the examination of the State Board should omit therapeutics. That will allow the homeopath, the osteopath, the eclectic, or anybody else that wishes to practice sectarian medicine to pass some examination in it, but they would not be required to pass an examination in therapeutics. The more I think of it the more I think that would be a very excellent law, and I hope that all of us will do everything we can to encourage men to come in, no matter what their ideas are regarding private matters.

I am reminded a few years ago, Mr. Noyes, of Noyes Brothers & Cutler, was appointed on the Board of the Presbyterian Synod or Conference that had to do with the rewriting of the creed. Judge Thomas Wilson, formerly of Winona, met him on the street, and Noyes said to him: "Judge, you know I am going to New York to assist in rewriting the creed; have you any suggestions?" Judge Wilson replied: "Brother, save as many as you can."

THE PRESIDENT: Probably the most important medical association in the world is the American Medical Association. This may be largely due to the efforts of the profession as a whole but I think it is particularly due to the activity of the officers of that body. Dr. Olin West is here and I will ask him to take part in the discussion.

DR. OLIN WEST, Chicago: I count it a very great privilege to be permitted to attend this meeting of the Minnesota State Medical Association, at the invitation of your President and Secretary, as a representative of the headquarters organization of the American Medical Association, from which I bring you assurances of very willing service. I can also assure you of the existence of a very earnest desire on the part of the officers of our national organization to co-operate with the officers and members of this state association for the advancement of the cause of organized medicine in Minnesota and in our whole country. Among the officers of the American Medical Association are two distinguished members of the Minnesota State Medical Association—your honored president, Dr. Judd, and Dr. Thomas McDavitt. of St. Paul. Dr. Judd, as a member of the Council on Scientific Assembly, and Dr. McDavitt, as a member of the Board of Trustees, have served faithfully and well and, in their service, have splendidly represented their state society. I should like to say, also, that, in the conferences and meetings in which it has been my pleasure to be associated with him, your secretary, Dr. Drake, has carried the Minnesota banner with great credit and has made distinct contribution toward the furtherance of the

plans that have been made for perfecting and extending the work of medical organization.

It has been a great pleasure to hear the informative address delivered by President Judd, and the live paper of Dr. Savage, which I feel sure will stimulate thought and lead to the formation of needed convictions and, finally, to a crystallization of opinion that will bring about such corrections as may be necessary and can be made through the established agencies of medical organization.

I am one of those who do not believe that the real medical profession has lost in the esteem of the public, nor that it is without influence with the public. On the other hand, I believe that the true physician and the real profession which he represents stand higher in public esteem than ever before and exercise a greater and more helpful influence than ever before. The work and the benefits and the influence of scientific medicine have been carried to the ends of the earth and in every land into which the light of civilization has penetrated the beneficent ministrations of physicians are being received and are gaining for the profession an esteem and confidence and influence greater than have ever before been enjoyed. Within the recent past I have had the privilege of exchanging greetings with a physician who does his work in far off Thibet, another who labors under a burning sun in tropical India, another from the remote recesses of interior Africa, and still another whose sphere of work is within the circle of the effulgent rays of the midnight sun. As I go about in our own country, I see great hospitals filled with those who believe and trust in the medical profession and turn to its members for aid when in distress by reason of disease, and I see other hospitals being erected by public subscription in order that the people may have the benefits of medical service under the best possible conditions. I see record breaking attendances at our society meetings and note what seems to me to be an air of unusual prosperity about those present. When I have opportunity to call on my medical friends at their offices, very frequently I find all chairs taken by patients who have to wait so long that one cannot doubt their entire confidence in the doctor for whom they wait, if not in scientific medicine in its entirety. The inquiries that pour over my own desk teach me that the people believe in the medical profession and in its ability to interpret and apply the facts and methods that scientific medicine has developed.

If Dr. Savage will draw his strictures within somewhat closer lines and make his observations to apply in somewhat more narrow latitude I will be able to agree with him in most particulars. There *are* certain things about which we need to ponder and we *do* need to look ourselves as a profession squarely in the face and to heed some of the signs of the times. There are tendencies that need to be checked; there are, perhaps, some incumbrances which might be removed by an assumption of leadership which the profession has been slow to assume, though it seems to rightfully belong to it. It is undoubtedly true that individual members of the medical profession, some of whom are within the pale of medical organization, are guilty of reprehensible practices and that their transgressions bring reproach on the whole profession. Here is a job for medical organization to do, here is a reason for striving to perfect organization and for stimulating the zeal and efficiency of our component societies. In some spots our boards of censors and our councilors need to get busy. The membership of the American Medical Association, which is the combined membership of all of our state associations, was more than 90,000 on October 1. This peak will not be maintained, because many become indifferent or careless about maintaining membership and neglect to attend to the payment of dues until rather late in the year. We need some of those who are out, in; we also need to have some of those—a few—that are in, out. The men who will not live up to the ideals of organized medicine, the men who violate the principles to which organized medicine holds, the men who will not subscribe to nor support the ethics of the profession and who will not live up to its traditions are not those about whom the protecting arm of our organization should be thrown nor to whom our recognition as an organized profession should be extended.

Dr. Savage has offered some fine suggestions as to what can be done along certain lines and I am glad that I can tell you that the American Medical Association is doing some of the very things he suggests. Some of these activities have been lately undertaken, some others are fairly well established. *Hygeia*, a journal of individual and community health, represents an effort upon the part of the Association to give to the public dependable information about the aims, purposes, possibilities, and even the limitations of scientific medicine. There is, it seems, some difference of opinion in the profession as to the wisdom of publishing such a journal. And, by the way, right there we encounter a difficulty which points out our need for more active, more earnest and more efficient medical societies, especially in our counties. It is extremely difficult, sometimes, even for those on the watch towers, to determine just where the weight of opinion lies. Better working societies would effect the crystallization of opinion so that surer guidance might be had. *Hygeia* now has a circulation in excess of 20,000. Some medical societies have subscribed for enough copies of the magazine to distribute it among all teachers, preachers and public officials within their respective territories. "Clip sheets" carrying abstracts of articles appearing in *Hygeia* are being sent to newspapers and other lay publications and are, to some extent, being used by them.

The Bureau of Health and Public Instruction will, when the necessary organization can be perfected, prepare articles for the use of county or district societies to be published in newspapers. The matter of the preparation of articles to be distributed among newspapers all over the country is now being considered. Already a member of the editorial staff has written some articles of timely interest which have been distributed widely by a newspaper syndicate, which no doubt many of you have seen in print.

The Bureau of Health and Public Instruction has also begun an effort to utilize the radio to good advantage. A representative of that Bureau has been on the program of Station KYW in Chicago several times and plans are being considered for extending this kind of service to other radio stations in a number of cities.

The Bureau of Legal Medicine and Legislation, under the immediate direction of Dr. W. C. Woodward, is working

might and main for protection of professional interests and for the public welfare. This Bureau is devoting itself to the study of legislation in which the medical profession is interested, whether for its enactment or defeat, and is lending all possible aid to the legislative committees of state medical associations. It is difficult to make the public or the members of legislatures understand that legislation proposed by our medical organizations is designed for the benefit of the people. I would not like to have public esteem for the medical profession measured by the response that we get in some state legislatures when we appeal to them for the enactment of laws which we sincerely believe will redound to the public good. Incidentally, if I may be permitted to give expression to a personal opinion, it appears to me that some of our committees offer too many bills. There is no virtue in superabundant legislation. The Bureau of Legal Medicine and Legislation has done some very effective work with government bureaus in Washington and is still struggling with them in an effort to secure relief from multitudinous rules and regulations that are confusing, if not oppressive.

I have trespassed too long on your time and patience, though I would like to try to tell you of more of the work that is being undertaken by the American Medical Association. There is nothing that can take the place of scientific medicine. The profession has but to deliver adequate service to those who are in need, whether they be rich or poor, great or small. It is the job of medical organization to help its members to deliver such service and there is much that our societies can do to that end if they will seize on the opportunities that offer.

DR. J. T. CHRISTISON: I had the privilege of reading Dr. Savage's paper one day last week and incidentally discussed the matter at considerable length with him. Doubtless much of what he says is true, but I take a more optimistic view of the subject. I do not believe that the medical profession has so far lost the esteem of the public that we need worry so very much about it. It is true that we have ourselves largely to blame for many of these things. We try in our way to educate, through propaganda and publications of one sort and another, and yet, when we try to present matters pertaining to public health to our legislative bodies, we are met with the most unkindly reception. We are led to believe that the legislature feels that we are doing these things from a purely selfish motive, that we want to put the other fellow on the shelf and have everything for ourselves.

Take for instance the propaganda against the spread of tuberculosis. I am connected with an organization in St. Paul which has been carrying on that sort of work for a number of years. Try to get something into the newspaper that is receiving money from patent medicine advertising and you will find that that is about the most difficult job you ever tried to do. The public, as a whole, perhaps are not particularly interested in this phase of the subject, and the strangest part of it all is that it is not the ordinary individual, it is the educated individual who is ever ready to take up any new fad no matter how chimerical it may be. Possibly this is just human nature, reaching out for the unattainable. The alluring advertisements in the newspapers lead people suffering from chronic ailments to grasp, as it were, at a straw. We all know perfectly well that a large percentage of human ills get well after a while anyway, and the charlatan and the irregular practitioner to whom these people go get the credit for curing them.

Dr. Savage referred to the medical practice act that we tried to introduce at the last legislature. One of the most curious things, as far as the attitude of the lawmakers was concerned, was that dotted all over the house were men who were perfectly ready and willing to tell of the wondrous things that the chiropractor or the osteopath or some other "path" had done for them and not one friendly voice raised in defense of the medical profession. I am firmly of the belief that we ought to have organization. Let us constitute ourselves, each one individually, into such committee and apply the golden rule to the practice of medicine, put our patients first, last and all the time in the foreground and give them the very best that is in us. Do the work that comes to us as well as we can do it and let time and education take care of the rest.

DR. F. J. SAVAGE (closing): I am not a pessimist on this subject, I feel decidedly optimistic. I think, however, that we do not get anywhere by taking the attitude of the ostrich in putting our heads in the sand or patting ourselves on the back and say there is nothing beyond, that there is no chance for more because we have reached the goal. The way I became interested in the subject was through our work with the legislature. I am perfectly willing, if the Editing and Publishing Committee wishes to take the suggestion of Dr. S. Marx White and eliminate the word "Why" in the title and make it read as though it were a question rather than a definite statement: "Has the Medical Profession lost the Position it Once held in the Esteem of the Public?"

MINNESOTA MEDICINE

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EDITORIAL

Publicity

The opinion is occasionally expressed by members of our profession that it is not at all incumbent on us to carry on publicity work through our county, state or national medical organizations. They admit that we, as physicians, should be ready to give advice on health matters affecting the public at large when it is requested.

The public health movement of today constitutes more than a request—a demand, not only for information but for active measures in health matters. What are we going to do about it?

As far as the medical profession is concerned, publicity and education in matters pertaining to health go hand in hand. The public is little interested in our organizations; they are interested in facts pertaining to their individual health.

Each county society should have a publicity committee or committee on public health. It should be the function of such a committee to maintain a list of physicians available for publicity work in connection with cancer week, child health days, and the like. The listed physicians can then be called upon to address local civic organizations requesting such services.

The newspaper is the very best vehicle for publicity. The daily columns written by Drs. Brady, Evans, and more recently by a former president of our national association, Dr. Charles A. L. Reed of Cincinnati, have done more towards directing the public to right ways of thinking on medical subjects than the combined activity of the organized medical profession. These men should be encouraged in their good work.

As a means of publicity, the radio is undoubtedly a close second. We are informed that last year the Westinghouse Company alone sold two million receiving sets throughout the country. One large sending station estimates it reaches anywhere from 100,000 to 500,000 individuals at a time. The so-called medical cults are utilizing this means for advertising purposes and show some sagacity by employing real artists, interspersing the numbers with a word about the advantages of their particular method of treating human ills. There is every reason in the world why the organized medical profession should employ the radio for directing the public aright. We say organized advisedly, for as the situation is today physicians outside the pale of the county societies are using the radio for private advertising.

The Hennepin County society has recently taken the stand that no members may speak over the radio unless anonymously. The radio refuses anonymous speakers, insisting that the public, out of courtesy, is entitled to know who is addressing them. The radio company has no objection to announcing that the Hennepin County Medical Society is sending a representative to make an address on a certain subject, the speaker being Dr. ———. They call attention to the fact that it is not so important to the public that the speaker is a physician as that he is representing a certain society. Recently the Publicity Committee of the Ramsey County Medical Society appointed one of its members, a surgeon in private practice, to give an address over the Twin City radio. The address was passed on first by the committee. This is an important point. If physicians in private practice are to make addresses over the radio, it must be

done on authorization by a county society committee and the address must be read and approved by the committee. Recently an address on Insulin was made in Chicago by an A. M. A. representative. In the next twenty-four hours he received thirty-one requests for his services in consultation and was forced to explain he was not in private practice.

This matter is still in the hands of each county society for individual society action. Radio publicity work by physicians in private practice may be easily abused. It is probable that much difficulty will be avoided by limiting radio addresses to full time medical men such as members of the University Medical School faculty, State Board of Health, Minnesota Public Health Association and the like. The American Medical Association is sending clippings from Hygeia to various parts of the country for radio transmission—a very admirable activity.

After all is said and done, the very best means of reaching the public is through the 150,000 physicians in the country. Correct medical advice rendered the people by this army of physicians should suffice in itself. The ideas communicated to patients will be further transmitted by them. Knocking the other fellow does the knocker the most harm and the same applies to our treatment of the cults. This does not mean, however, that we should not take a firm stand and express our honest opinion of spinal manipulation for all ills and the limit of the power of mind over matter.

It is the prime function of organized medicine to make better physicians of its members so that we can render better service to our patients. If we do this, we as a profession have nothing to fear from the ephemeral cults which always have existed and always will exist in one form or another.

This point should not be lost sight of, however, that even if we as a profession do not suffer, the public does. We have a certain duty to perform to present to the public the facts, and they can use their judgment in seeking medical advice.

Medical Defense

The Minnesota State Medical Association has provided legal defense to its members for a number of years. This provision cares for attorneys' and witness' fees but does not provide for the payment of judgments. For this reason a large percentage of the Association membership carries additional professional insurance in private companies.

While a member is entitled to legal defense, the provision in the By-Laws of the Constitution imposes certain restrictions. One such provision is to the effect that the Association attorneys must be given "sole power to conduct the defense." This provision for the sake of expediency has not been strictly adhered to.

The legal expense of the Association having increased so materially the past two years, the matter was discussed by the officers of the Association at this year's meeting and it was decided to call the attention of the members to this provision in the Constitution, which will be strictly adhered to in the future.

A member carrying insurance privately as well as through his Association membership is entitled to legal defense from either agency—but not to both. The above mentioned provision clearly indicates this point. Members in need of legal services will save time and avoid misunderstanding and confusion if they will bear this point in mind.

Dr. Warren A. Dennis

When a man dies he leaves behind his worldly possessions, and an intangible heritage sometimes infinitely more valuable. This is especially true of members of our profession. When Dr. Warren A. Dennis passed to the other side he left behind the memory of a life of helpfulness to his fellow man, and of a character, the nobility of which has left a profound impression on all who knew him. His was a most successful life, measured by the true standard of success. If to be of sterling integrity, true to the ideals of his profession, alert to the needs of the suffering, in the forefront of scientific attainment, strong in his conception of right and duty, vigorous in his denunciation of sham and pretense, qualify one for respect and honor, these he possessed in marked degree.

From early boyhood he carved his own way, ever holding fast to the principles of right living and to the demands of honorable life. In his profession he attained a high place. Among his patients he won warm friends and admirers. In civic life he did valiant duty. With exalted patriotism he offered himself freely to his Country

in two conflicts, serving with marked distinction wherever duty called him. He was a man of broad interests. His mind was logical, his perceptions keen, and his emotions responsive to the great questions which concern humanity. He was interested in all those social and economic problems which tend to make better men and better citizens, and his influence among his friends and acquaintances was always directed for their betterment.

But above all we loved him best as a friend. Loyal and dependable, we always knew that we could reach out to him for sympathetic understanding, for generous helpfulness, for sound counsel and warm response. Optimistic, cheerful and buoyant, he seemed to make those about him share in these genial qualities. He will be much missed and long remembered by his many friends.

MISCELLANEOUS

Post Graduate Work in Europe

To those who are contemplating post graduate study abroad, a few words regarding opportunities there, gained from recent experiences, might be of interest. The writer spent a month in London a year ago and found some excellent work in cardiology at the National Hospital for Heart Disease and at University College Hospital under Sir Thomas Lewis, and in neurology at the National Hospital for Paralysis and Epilepsy with world famous men on the staff. However, the clinics are widely scattered; it is hard to work out any sort of a full day's program with the type of work wanted, if one is exacting.

In Berlin, the men studying there seemed satisfied. There were about twenty-five on the ground, maintaining a loose organization, the American Medical Association of Berlin, but the men were scattered about in various clinics doing individual work. Some of the clinics were free, such as the winter term course of lectures by Krause, and it was possible to fill in the morning with such courses, leaving the afternoon free for private tutoring, costing about two dollars an hour from a professor and one dollar an hour from men of lesser rank, with operative work at specified fees per operation. Many men, especially in various surgical specialties, seemed to think a combination of Vienna for grounding in fundamentals and didactic work, with a topping off in Berlin with operative work, was excellent, on account of greater freedom in the matter of operations. Most of the men who became acquainted in Berlin remained there and the reverse was true for Vienna. What effect the present economic and political conditions have had in post graduate work is unknown.

A few men who had worked in Paris were seen and they were enthusiastic. A knowledge of French is imperative, but as Paris is making a bid for the lead in post graduate work, the instruction may in time be offered in English. Neurology and dermatology seemed to offer the best opportunities.

Judging from personal experience and considerable discussion with men who have studied elsewhere, Vienna occupies a unique position as a post graduate center because of thoroughly organized relations between teachers and students. Teaching is a tradition there; the instructors are well trained, sound clinicians; clinical material in abundance is available; the rule of one hundred per cent autopsies makes only for accuracy; and, what is more important, this teaching can be bought almost as a commodity. The old pre-war American Medical Association of Vienna is completely revived, with the same furniture, the same old registry book on file bearing the names of former members, among them many who have helped to build up medicine in the Northwest; and the same desk secretary, Mrs. Kreidl, in charge. There was a stormy period of rebirth about two years ago, but the differences between the Americans and the Vienna faculty have been largely smoothed over and there is no more friction than is to be expected between two large bodies of men.

This organization has nothing to do with the A. M. A. Any English speaking doctor (there are always representatives from various countries of the British Empire) doing post graduate work in Vienna is eligible for membership; the dues are nominal. There are some social features, but the main function is a clearing house for post graduate courses. One member is elected to act as orientation man for each specialty, to arrange new courses, keep courses posted on the bulletin board in his specialty, in short to attempt to make supply and demand meet. The association has entered into contracts with various members of the faculty to teach certain subjects at a fixed price per hour. The courses cost usually three to five dollars an hour and must be paid for in American money to be divided by the members taking the course, running from two to twenty-five members. The by-laws and constitution of the organization, with a list of courses for which it holds contracts, is embodied in the "Blue Book," which may be obtained from the secretary at a cost of twenty-two cents.

Has there been any deterioration in the post graduate work compared with pre-war days? Several men back on their second, third or even fourth trip say "No." One man in particular, who was back on his fourth trip and had spent a total of two and a half years in Vienna, remarked that he had never had so good a program as this spring.

So far as living conditions are concerned, Vienna is quite safe. There are no food riots. It is not the city it once was, but quite tolerable. Since the stabilization of the crown at about seventy thousand to the dollar, accomplished by stopping the printing presses, there has been a slow but definite improvement in general conditions, with gaining confidence in the deflated currency. The professional classes are recovering a little of their lost ground through readjustment of values. The cost of living is considerably higher than before the war, but still somewhat under the cost here.

The best form of money to carry to Vienna is the American Express Company's travelers' checks, and a roll of greenbacks is always an asset. Letters of credit are a nuisance.

As many of the courses are in English, a knowledge of German is not absolutely necessary, but to one who has a knowledge of German, opportunities are tripled and it is mighty convenient in traveling; so it pays to "plug" on a vocabulary.

REUBEN A. JOHNSON, M.D.

REPORT OF A CASE OF LOCAL MALARIA*

HARRY OERTING, M.D. and CLARENCE E. KJOS, M.D.
St. Paul

G. J. D. Female. Age 37.

Past History. Smallpox 1912. Diphtheria and "Rheumatism" 1914.

Menstrual History. Regular with excessive flowing. In September the patient went over her period four days and took 36 grains of quinine. The period began the next day.

Present Illness. All during the past summer the patient felt indisposed and tired, which she attributed to overwork. About September 24th she contracted a mild cold which lasted about two weeks. On October 11th at 7 p. m., the patient suddenly had a severe chill, duration one hour, followed by fever, headache and profuse sweating most of the night. The following day she felt as well as usual. On October 13th late in the afternoon the patient had a severe headache and felt chilly but did not have a real chill. On October 14th patient felt as well as usual. On October 15th at 10 a. m. there was another sudden severe chill followed by headache and fever and she was sent to the hospital by her physician. On entrance to the hospital at 10 p. m. the temperature was 99.5 and the following afternoon had dropped to normal. The urinary examination was negative. Blood Hgb. 60 per cent; R. B. C., 4,000,000; W. B. C., 5,700. Differential Pmn., 73; Lymph, 22; Trans., 4; Baso., 1 per cent. Wassermann negative. Blood culture taken October 16th, negative. On October 17th at 8 A. M. there was another severe chill and the temperature reached 104 degrees. Blood cultures taken at this time were negative. Blood smears for parasites showed probable malaria. On October 18th patient felt well and wanted to get up and about. On October 19th at 5 a. m. there was another severe chill and the temperature reached 104 degrees. Blood examination, Hgb., 60 per cent; R. B. C., 3,990,000; W. B. C., 9,650. Differential Poly. 52, lymph 37, Lmn. 7, Trans. 2, Baso. 1. One normoblast was seen. Blood smears showed the malaria parasite of the tertian type. A chill was predicted for between 2 and 3 A. M., October 21st. At 1:55 A. M., October 21st, the patient had another typical chill and the temperature reached 104.5 degrees. Quinine therapy was then instituted and there were no further chills. Blood smears taken on October 23rd showed an occasional fourth stage parasite.

Although the government survey shows malaria as endemic in the state, the occurrence of this disease in a person who was born and raised in the immediate vicinity of St. Paul and who has never been away from this district except for a three day trip to Duluth in 1918 seems worth reporting in order to draw attention to the fact that local malaria can and does exist and should be ruled out in all cases with recurrent chills and fever.

*University Medical Service, Ancker Hospital

OBITUARY

DR. WARREN A. DENNIS

Warren Arthur Dennis, second son of Jesse Dennis and Anna Warren, was born on a farm in Walworth County, Wisconsin, December 5, 1869. His death occurred at St. Paul, November 8, 1923. He received his early education in the public and high schools of Sharon, Wisconsin, and after two years spent as a teacher in a district school entered the University of Wisconsin, from which he was graduated with the degree of B.L. in 1891. From then until he entered the medical department of the University of Minnesota his time was spent as an instructor in the Reform School at Chippewa Falls, Wisconsin, where he made a most enviable record.

He received his degree in medicine with the class of 1896 and after a year's internship in the City and County Hospital, St. Paul, he became associated with the late Dr. C. A. Wheaton and Dr. John T. Rogers, under the firm name of Wheaton, Rogers and Dennis. It was here that opportunity afforded him the means to develop his natural talent for surgery, in which special line of work he was later to become so proficient. In 1904 Dr. Dennis severed his connection with the firm and formed an association with Dr. Judd U. Goodrich, which lasted until Dr. Goodrich's death in 1911. Later association was had with Dr. John C. Staley and Dr. James S. Gilfillan. In the autumn of 1920 Dr. Dennis and Dr. Gilfillan joined in the formation of the Miller Clinic.

Dr. Dennis was married in 1904 to Clara Clark, who, with six children, survives him. Dr. Dennis twice answered the call to arms, serving with distinction in the Spanish American War, holding the rank of Major. During the World War he was assigned to the 88th Overseas Division and did notable work in brain surgery. He entered the service with the rank of Major, later being promoted to that of Lieutenant Colonel.

His was a life of unswerving devotion, a surgeon of more than ordinary ability, who gave his patients his devoted, untiring attention and won for him a lasting place in their affections. To have been associated with Dr. Dennis in any capacity was a rare privilege, to have been accounted his friend was an honor.

His co-workers have lost a wise counsellor, his friends a loyal, true hearted comrade, and his patients a beloved physician. Dr. Dennis was prominent in the life of many medical organizations, serving as president of the Ramsey County Medical Society in 1910; president of the Minnesota Academy of Medicine in 1920; and some time president of the Alumni Association of the Medical Department of the University of Minnesota. At the time of his death he was a member of the Council of the Minnesota State Medical Association, Associate Professor of Surgery in his Alma Mater, Surgeon to the Chicago Great Western and the Great Northern Railways, Secretary of the Western Surgical Association and a Fellow of the American College of Surgeons.

REPORTS AND ANNOUNCEMENTS OF SOCIETIES

THE MINNEAPOLIS SURGICAL SOCIETY MONTHLY CLINIC DAY

Thursday, December 6th, 1923

ST. MARY'S HOSPITAL
9:00 to 12 A. M.

OPERATIVE CLINICS

Dr. Sweetser	Dr. Farr	Dr. Corbett
Dr. Mann	Dr. Lynch	Dr. Maxeiner
Dr. Webb	Dr. Bratrud	Dr. Zierold
	Dr. Hayes	

ST. MARY'S HOSPITAL
2 to 4 P. M.
Pathological Meeting

DINNER AT ST. MARY'S HOSPITAL
6:30 P. M.
Followed by the paper of the evening
"ORAL SURGERY"
by
Dr. T. W. Brophy of Chicago
Discussion by Dr. H. P. Ritchie of St. Paul

LYON-LINCOLN COUNTY MEDICAL SOCIETY

At the regular annual meeting of the Lyon-Lincoln County Medical Society held Tuesday, October 16, 1923, the following officers were elected for the coming year: President, Dr. J. B. Robertson, Cottonwood; vice president, Dr. Charles Germo, Balaton; secretary-treasurer, Dr. H. M. Workman, Tracy. Dr. A. L. Vadheim, of Tyler, was elected to act as delegate to the 1924 annual meeting of the State Association and Dr. B. C. Ford, Marshall, alternate.

ST. LOUIS COUNTY MEDICAL SOCIETY

Dr. T. R. Martin, of Duluth, was elected president of the St. Louis County Medical Society at the annual banquet and meeting held at the Chamber of Commerce building, Duluth, Thursday, October 18. Other officers elected for the ensuing year were: First vice president, Dr. James Steward, Cloquet; second vice president, Dr. J. R. Manley, Duluth; secretary-treasurer, Dr. F. H. Magney, Duluth, who was re-elected.

The election followed the banquet, which was well attended. During the meeting Dr. S. H. Boyer gave a talk on "Professional Ethics."

OF GENERAL INTEREST

Dr. E. M. Kingsbury, of Clearwater, and Miss Hannah Jane Nelson were married at Clearwater October 8.

Announcement has been received of the birth of a son to Dr. and Mrs. Alvah Conley, of Cannon Falls, Tuesday, October 16.

Dr. H. Boyeson, a graduate of the medical school of the University of Iowa, has located at Truman for the practice of his profession.

Dr. C. A. Lester, formerly of Winona, is now engaged in the practice of his specialty, diseases of the eye, in Eau Claire, Wisconsin.

Dr. and Mrs. A. W. Ide, of St. Paul, have returned from a four months' trip to Europe, where Dr. Ide visited the principal hospitals and clinics.

Dr. J. P. Von Berg, of Albert Lea, who suffered injuries as the result of an automobile accident, November 5, is reported as recovering nicely.

Dr. H. W. Hundling, formerly of the Mayo Clinic, Rochester, is now associated in the practice of medicine with the Sanders-Warr Clinic, Memphis, Tenn.

Professor Finsterer, of Vienna, gave a Mayo Foundation lecture before the Mayo Clinic and Fellowship staffs, October 19. His subject was "Gastro-jejunal Ulcer."

Dr. A. E. Mark, of the Earl Clinic, St. Paul, will leave January 1, 1924, for Long Beach, California, where he will locate and will specialize in internal medicine.

Dr. A. A. Meyer, of Melrose, was elected mayor at the biennial city election held recently in Melrose. Mr. Meyer succeeds Andrew Kolb, who had been mayor for two terms.

Dr. and Mrs. Walter E. Camp, of Minneapolis, have returned from a three months' tour of France, Switzerland, Austria and England, where Dr. Camp visited the principal clinics of Europe.

Announcement has been made of the marriage of Dr. Kenneth Bulkley, of Minneapolis, to Mrs. Mary Gosling, nee Mary Saunders, of St. Paul, which took place in St. Paul, November 6, 1923.

The Abbott Hospital, Minneapolis, is to receive a fund of $500,000 through a bequest made by the late Oliver C. Wyman, of Minneapolis, in his will, which was filed for probate in the Hennepin County District Court in November.

Dr. Lysander P. Foster, known as Minneapolis' oldest physician, celebrated his eighty-seventh birthday November fourth. Dr. Foster came to Minnesota in 1848 when there were but two white men living where Minneapolis now stands.

Dr. Botho Felden has become a member of the Nicollet Clinic, of Minneapolis, as dermatologist. Dr. Felden served three years in the dermatological clinic of Professor Max Joseph, of Berlin, and for two years was in the clinic of Professor Arndt at the Charitеé Hospital.

The marriage of Dr. B. A. Dvorak, of New Prague, to Miss Beatrice Pesek, of Minneapolis, took place Monday, October 15, in Minneapolis. Dr. and Mrs. Dvorak are now at home in Ames, Iowa, where Dr. Dvorak will be in charge of the students' infirmary at the state college.

Dr. Helen H. Hielscher, of Mankato, chairman of hospitalization of the Minnesota department of the American Legion auxiliary, is to be presented with an appropriate medal as president of the first state department of the auxiliary and president of the first national auxiliary convention.

Dr. W. F. Cantwell has closed his practice at Littlefork to become associated in the practice of surgery with Dr. Fred Lund, of Boston. Dr. and Mrs. Cantwell have been in New York for the past month and expect to establish their home in Boston some time during December.

Dr. and Mrs. A. G. Beyer have returned to Red Wing following a stay of several months in Vienna, where Dr. Beyer took postgraduate work in the treatment of diseases of the eye, ear, nose and throat. Dr. Beyer plans to practice his specialty in his former location at Red Wing.

Dr. W. L. Sogge, of Windom, was elected president of the Minnesota State Sanitary conference which was held in St. Paul in November. Other officers elected for the coming year were: Vice president, Dr. G. G. Balcom, Lake Wilson; secretary and treasurer, Dr. A. J. Chesley, St. Paul.

"The Physical Basis of Radiotherapy" was the subject of an address delivered by Professor L. M. Henderson at a meeting of the Minnesota Pathological Society held at the Institute of Anatomy, University of Minnesota, November 20. Dr. E. T. Bell also read a paper on "Sarcoma of the Bones."

At the meeting of secretaries of the various state medical associations held in Chicago in November, 1923, attention was called to the circulation of Hygeia in the different states of the Union. The widespread circulation of this lay magazine was conspicuously brought out on a specially prepared map, showing the number of subscriptions in each state. Minnesota has 425 subscriptions or 17 per 10,000 population, which puts us twenty-ninth in the per capita list of states. Arizona made the best showing with 85 per 10,000.

At a meeting of the Administrative Board of the Medical School of the University of Minnesota, held November 6, 1923, the following nominations were approved and recommended: Dr. Harold J. Goss as Instructor in Ophthalmology and Oto-Laryngology; Dr. Joseph F. Bicek as Assistant in Obstetrics and Gynecology; Dr. C. A. Fjelstad as Assistant in Ophthalmology and Oto-Laryngology; Dr. Eula B. Butzerin as Instructor and Director of Public Health Nursing; Miss Alma Haupt and Miss Alice Fuller as Instructors in Preventive Medicine and Public Health.

Dr. R. E. Farr, of Minneapolis, has planned for medical graduates a series of short intensive courses in clinical demonstrations of the various methods of employing local anesthesia at St. Mary's Hospital, Minneapolis. These courses will begin Monday, January 7, 1924, at 9 a. m., at St. Mary's Hospital. Two courses will be given each month, with classes beginning on the first and third Mondays. They will be largely didactic, covering the drugs used, their preparation, etc., the anatomy of the sensory nervous system and laboratory courses on the cadaver. In addition to demonstrations, those taking the course will practice the introduction of the needles and segmental dissection.

The Children's Hospital, Inc., of Saint Paul, will be opened January 1, 1924. The hospital will occupy temporary quarters at the corner of Smith avenue and Walnut street. The Board of Trustees of the Children's Hospital has made arrangements with St. Luke's Hospital, which is adjacent, to provide training for nurses. The business management of the Children's Hospital has purchased a permanent site at 311-319 Pleasant avenue and will occupy the present quarters until the new hospital is built. The Children's Hospital, which is non-sectarian, will receive children from birth to adolescence and will be prepared to give them all necessary medical and surgical aid. The hospital will have a complete staff, of which Dr. W. R. Ramsey will be chief.

"Human Cancer from the Standpoint of Heredity" will be the subject of a lecture to be given by Professor H. Gideon Wells, of the University of Chicago, before the Mayo Clinic and Fellowship staffs at Rochester, December 4. This is the fourth in a series of lectures on heredity which was arranged by the Mayo Foundation in co-operation with the Rochester chapter of Sigma Xi and the Universities of Wisconsin, Minnesota, Nebraska and Washington (St. Louis, Mo.) this fall. The first of these was given Monday evening, October 29, at the University of Wisconsin by Professor William Ernest Castle, professor of zoology at Harvard University on "Heredity—The General Problem and Its Historical Setting." The same lecture was delivered at Rochester, Tuesday, October 30, at Minneapolis Wednesday, at Omaha Thursday, and at St. Louis Friday. Two lectures delivered in November were: "The Inheritance of Acquired Characteristics," by Professor J. A. Detlefson, Wistar Institute, Philadelphia, and "Heredity in Relation to Cancer," by Miss Maud Slye, of the University of Chicago. Two other lectures to be given early next year on dates not yet fixed will be on "The Inheritance of Sex," by Prof. C. E. McClung, University of Pennsylvania, and "Eugenics," by Prof. M. F. Guyer, University of Wisconsin.

J. M. McConnell, State Superintendent of Education, has been officially notified of the opening of the Prize Essay Contest of the American Chemical Society in which all students of high and secondary schools in the State of Minnesota have been invited to compete in a national contest for $10,000 in cash prizes and scholarships to Yale, Vassar and other universities and colleges.

The contest, which is the result of the gift of Mr. and Mrs. Francis P. Garvan, of New York, is a memorial to their daughter, Patricia, and is intended to stimulate interest among high school students in the development of chemical science in this country. All arrangements for the contest are in the hands of the Committee on Prize Essays of the American Chemical Society, with headquarters at the Munson Building, New York City. Six prizes of $20 in gold are to be awarded in each State in the Union and scholarships to Yale and Vassar will be given for the six best essays in the United States. These scholarships will carry with them tuition for four years in chemistry or chemical engineering and $500 a year in cash. In addition to these awards many other scholarships will be offered through various universities and colleges. A set of five books which include Creative Chemistry by Slosson, The Riddle of the Rhine by Lefebure, The Life of Pasteur by Vallery-Radot, Discovery, The Spirit and Service of Science by Gregory, and the Future Independence and Progress of American Medicine in the Age of Chemistry by a Committee of the American Chemical Society, is being sent from the New York headquarters to every accredited high and secondary school in the country, and sets of these reference books are being placed in the leading libraries of the State for the use of students who enter the competition.

The contest which has the endorsement of Dr. John J. Tigert, Commissioner of Education of the United States, is fully described in a pamphlet, which will be distributed through the high schools and the libraries. This pamphlet

contains in addition to facsimile letters of endorsement from Dr. Tigert, and from Dr. E. C. Franklin, President of the American Chemical Society, a full outline of the terms and conditions of the contest together with the letter of gift of Mr. Garvan. The entire supervision of the contest and the award of the prizes has been left to the American Chemical Society by Mr. Garvan. H. E. Howe, editor of "Industrial and Engineering Chemistry," the official organ of the American Chemical Society, has been named as Chairman of the Committee, and he is assisted by Dr. Wilder D. Bancroft, Professor of Chemistry at Cornell University, one of the best known men in educational circles in this country and president of the American Chemical Society in 1910; by Dr. Charles H. Herty, president of the Synthetic Organic Manufacturers' Association and president of the American Chemical Society in 1915 and 1916; and by Alexander Williams, Jr., of New York, who is acting as secretary of the committee. It is the plan of the committee in charge to appoint a national committee of fifteen who will be chosen from all walks of life; from among the leading educators, scientists and public spirited men and women of the country. It will be the duty of this committee to judge the essays and to award the scholarships in the national competition. They will be assisted in their work by state committees of eleven whose duty will be to award the prizes in the state competitions.

NEW AND NON-OFFICIAL REMEDIES

In addition to the articles enumerated in the November issue, the following articles have been accepted by the Council on Pharmacy and Chemistry for inclusion:

CHEPLIN'S BIOLOGICAL LABORATORIES:

Cheplin's B. Acidophilus Milk.

LEDERLE ANTITOXIN LABORATORIES:

Diphtheria Toxin Antitoxin Mixture (0.1 L+)-Lederle, 30 c.c. vials.

H. K. MULFORD COMPANY:

Diphtheria Antitoxin Standard-Mulford.

Diphtheria Antitoxin Superconcentrated-Mulford.

PARKE, DAVIS & COMPANY:

Antidysenteric Serum-P. D. & Co.

Protein Extracts Diagnostic-P. D. & Co.:

Colon Bacillus Protein Extract Diagnostic-P. D. & Co.; Gonococcus Protein Extract Diagnostic-P. D. & Co.; Micrococcus Catarrhalis Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 1, Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 2, Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 3, Protein Extract Diagnostic-P. D. & Co.; Pseudodipththeria Bacillus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Albus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Aureus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Citreus Protein Extract Diagnostic-P. D. & Co.; Typhoid Bacillus Protein Extract Diagnostic-P. D. & Co.

Silver Nitrate in Capsules-P. D. & Co.

New Tuberculin B. E. Dried.—To obtain this product, tubercle bacilli are dried, ground for several months in a ball mill, the finely disintegrated bacillary bodies are mixed with a suitable base and made into tablets. Each tablet represents a definite amount of New Tuberculin B. E. Dried.

Tablets Tuberculin B. E.-P. D. & Co.—New Tuberculin B. E. Dried, marketed in vials No. 1 of ten tablets, each tablet containing 0.0001 mg.; in vials No. 2 of ten tablets, each tablet containing 0.001 mg.; in vials No. 3 of ten tablets, each tablet containing 0.01 mg.; in vials No. 4 of ten tablets, each tablet containing 0.1 mg.; in vials No. 5 of ten tablets, each tablet containing 1 mg.; also marketed in packages of 5 vials, Nos. 1, 2, 3, 4 and 5 inclusive. Parke, Davis & Co., Detroit.

New Tuberculin T. R. Dried.—The mass culture of tubercle bacteria is washed repeatedly, agitated again in water, washed, ground to complete disintegration, extracted repeatedly with water, and the water-insoluble material, instead of being ground to form a suspension in water as in New Tuberculin T. R. Liquid, is dried. The dried material is thoroughly mixed with a suitable diluent. Each tablet represents a definite amount of dried tubercle bacilli.

Tablets Tuberculin T. R.-P. D. & Co.—New Tuberculin T. R. Dried, marketed in vials No. 1 of ten tablets, each tablet containing 0.0001 mg.; in vials No. 2 of ten tablets, each tablet containing 0.001 mg.; in vials No. 3 of ten tablets, each tablet containing 0.01 mg.; in vials No. 4 of ten tablets, each tablet containing 0.1 mg.; in vials No. 5 of ten tablets, each tablet containing 1 mg.; also marketed in packages of five vials Nos. 1, 2, 3, 4 and 5, inclusive. Parke, Davis & Co., Detroit. (Jour. A. M. A., Oct. 6, 1923, p. 1207.)

Sal-Ethyl.—A brand of ethyl salicylate-N. N. R. For a discussion of the actions, uses and dosage of ethyl salicylate, see New and Non-official Remedies, 1923, p. 272. Sal-Ethyl is supplied in the form of Sal-Ethyl Capsules, 5 minims. Parke, Davis & Co., Detroit. (Jour. A. M. A., Oct. 13, 1923, p. 1285.)

Antidysenteric Serum-P. D. & Co.—An antidysenteric serum (see New and Non-official Remedies, 1923, p. 287) obtained from horses immunized against several strains of Shiga and Flexner types of dysentery bacilli. It is marketed in packages of one syringe containing 10 c.c.; in packages of one vial containing 10 c.c.; in packages of one vial containing 20 c.c. Parke, Davis & Co., Detroit. (Jour. A. M. A., Oct. 20, 1923, p. 1363.)

Cheplin's B. Acidophilus Milk.—A milk culture of bacillus acidophilus, containing not less than fifty million of viable B. acidophilus per c.c. at the time of sale. For a discussion of the actions and uses of bacillus acidophilus milk, see Lactic Acid-Producing Organisms and Preparations (Jour. A. M. A., Sept. 8, 1923, p. 831). For adults the dose is from 500 c.c. to 1,000 c.c. Cheplin's B. Acidophilus Milk is marketed in bottles containing respectively 200 c.c. and 400 c.c. Cheplin Biological Laboratories, Inc., Syracuse, N. Y.

Diphtheria Antitoxin Standard (Purified and Concentrated Globulin).—Formerly marketed as diphtheria antitoxin concentrated (globulin). (See New and Non-official

Remedies, 1923, p. 283.) This brand of diphtheria antitoxin concentrated is also marketed in packages of one syringe containing 20,000 units. H. K. Mulford Company, Philadelphia.

Diphtheria Antitoxin Superconcentrated.—The product resembles serum antidiphthericum purificatum U. S. P. It differs in that the volume per thousand units is smaller, and the protein content is claimed to be lower. It is marketed in packages of one syringe containing respectively 1,000 units, 3,000 units, 5,000 units, 10,000 units and 20,000 units. H. K. Mulford Co., Philadelphia.

Protein Extracts Diagnostic-P. D. & Co.—In addition to the Protein Extracts Diagnostic-P. D. & Co. listed in The Journal, Sept. 15, 1923, p. 929, the following have been accepted: Colon Bacillus Protein Extract Diagnostic-P. D. & Co.; Gonococcus Protein Extract Diagnostic-P. D. & Co.; Micrococcus Catarrhalis Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 1, Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 2, Protein Extract Diagnostic-P. D. & Co.; Pneumococcus, Type 3, Protein Extract Diagnostic-P. D. & Co.; Pseudodiphtheria Bacillus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Albus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Aureus Protein Extract Diagnostic-P. D. & Co.; Staphylococcus Citreus Protein Extract Diagnostic-P. D. & Co., Typhoid Bacillus Protein Extract Diagnostic-P. D. & Co. Parke, Davis & Co., Detroit.

Diphtheria Toxin-Antitoxin Mixture (0.1 L+)-Lederle.—This product (see New and Non-official Remedies, 1923, p. 284) is also marketed in 30 c.c. vials. Lederle Antitoxin Laboratories, New York. (Jour. A. M. A., Oct. 27, 1923, p. 1441.)

PROPAGANDA FOR REFORM

J. T. Ainslie Walker's Latest Intestinal Disinfectant.—About a year ago a flood of reprints mailed from London reached the editors of American medical journals and others. The reprint dealt with "A New Suggestion in the Treatment of Puerperal Eclampsia," by Captain J. T. Ainslie Walker. The reprint was to the effect that as "the problem of intestinal disinfection has been solved" rational treatment of the condition was greatly simplified, but it was not stated how the problem of intestinal disinfection had been solved. A few months later, the same editors received reprints which dealt with "Dimol" in the treatment of summer diarrhea in infants, and an article by A. N. M. Davidson. Still more recently, American medical editors have received a pamphlet mailed from England which purports to be a book sent for review. This pamphlet is an obvious puff for Dimol by J. T. Ainslie Walker. Dimol is a preparation introduced by J. T. Ainslie Walker, of England, and is sold in this country by the Anglo-French Drug Co. Some time ago Mr. Walker was connected with the Barrett Manufacturing Co. to exploit "Pyxol," a proprietary disinfectant resembling compound solution of cresol. Later, Mr. Walker introduced his first "intestinal germicide" under the proprietary name "Trimethol." This preparation, which was reported on unfavorably by the Council on Pharmacy and Chemistry, appears to have been very similar to the product now exploited as Dimol. Mr. Walker would have us believe they are different, but the American agent of Dimol makes this claim: "Dimol is the registered name for the product known in the U. S. A. in 1914 under the name 'Trimethol.'" (Jour. A. M. A., Oct. 6, 1923, p. 1224.)

Colorless Iodin Preparations.—The so-called colorless iodin preparations do not contain iodin in the free state, but some form of combined iodin, chiefly iodid. For instance, Tinctura Iodi Decolorata, N. F., is a solution of sodium iodid and ammonium iodid obtained by mixing iodin and sodium thiosulphate, stronger ammonia water and alcohol. When tincture of iodin is used externally, it is with the view of obtaining the therapeutic action of free iodin. Since the colorless iodin preparations do not contain free iodin, their external use as a substitute for tincture of iodin is irrational. When tincture of iodin is given internally, the free iodin contained in it is converted into iodid before absorption. Therefore, tincture of iodin and the so-called colorless iodin preparations given internally have essentially the same therapeutic effect. However, if a colorless iodin preparation is to be administered, it would be simpler and more rational to administer sodium iodid. (Jour. A. M. A., Oct. 20, 1923, p. 1383.)

The Action of Arsenicals in the Body.—Voegtlin and his associates in the Hygienic Laboratory of the U. S. Public Health Service have observed that certain compounds containing sulphur groups in the SH form are able to counteract the toxic effects produced by arsenoxid on trypanosomes and a representative mammal. They advance the theory that arsenic in certain trivalent forms is a specific poison for the SH group in the trypanosome organism, and that arsenic causes death of the cells by interfering with the oxidative processes. Voegtlin and his associates concluded that the failures reported in the treatment of the later stages of syphilis are due to the fact that arsphenamin, neoarsphenamin and silver arsphenamin lack the essential penetrative power for the infected tissues, and for this reason they do not reach the last parasites in sufficient amounts to cause their death. In the effort to secure a more complete sterilization of syphilitic patients in the more advanced stages of the disease, sulpharsphenamin, tryparsamid, and 3-amino-4-oxyphenol arsenic acid are suggested for trial as remedies of superior penetrative power. (Jour. A. M. A., Oct. 27, 1923, p. 1442.)

Van Ess.—The Van Ess Laboratories, Inc., Chicago, put out "Van Ess Special Dandruff Massage" and "Van Ess Liquid Scalp Massage." "Van Ess" is sold with the claims that it will make hair grow and that it will stop falling hair in two weeks. The A. M. A. Chemical Laboratory reports that Van Ess Special Dandruff Massage is a perfumed liquid which separates into two layers on standing. The upper layer consists essentially of a petroleum oil which appears to be kerosene. The lower layer appears to be composed of water and alcohol containing small amounts of quinin sulphate, coloring matter and perfume. The Laboratory concludes that it is probable that a mixture of 35 parts of kerosene, 15 parts of alcohol denatured by the addition of 2 grains of quinin sulphate per fluid ounce and 50 parts of water would have whatever therapeutic properties the Van Ess Special Dandruff Massage possesses. (Jour. A. M. A., Oct. 27, 1923, p. 1461.)

PROCEEDINGS OF THE MINNESOTA ACADEMY OF MEDICINE

Meeting of October 10, 1923

Dr. A. S. Hamilton, Presiding

The regular monthly meeting of the Minnesota Academy of Medicine was held at the Town and Country Club on Wednesday evening, October 10, 1923. The meeting was called to order by the president, Dr. A. S. Hamilton. There were 29 members and 8 visitors present.

There were no papers read at this meeting, but the following case reports were given:

Dr. H. P. Ritchie reported a case (and showed lantern slide) of a bicornate uterus removed by vaginal hysterectomy.

Mrs. E. W., a patient of Dr. Frank Manson, aged 59, the mother of three children, had complained of cystocele and rectocele for several years. For the past year a vaginal discharge led to an examination revealing an ulceration of the cervix so gross as to suggest malignancy. Biopsy proved it to be not so. But the suggestion of operation upon the cervix and cure of the prolapse met with her approval. This was done May, 1923. In view of the ulceration, the procedure selected was an interposition operation. The usual steps were accomplished to the bringing down the left horn, which, as illustrated, was so small that it was most evident that it would be of no value as a support. It was then decided that the broad ligaments were better used, so the left ligaments were secured. It was then discovered that there were no right ligaments, but instead there was felt a hard body suggesting a malignant infiltration. But in the manipulation, the right horn was uncovered to find it the site of a fibroid. Back of this was a movable ovarian cyst of appreciable size. It was not until the right horn was discovered that the conditions were read out. The operation was completed and she recovered.

The features of the case are: The lack of symptoms leading to a diagnosis; the fact that this congenital deformity is a mother uterus; the presence of complicating tumors; and the almost exact symmetry of the surgical specimen showing a common cervix.

Dr. A. R. Colvin reported a case, with operation, of fracture of the anatomical neck of the humerus and dislocation of the head fragment into the axilla.

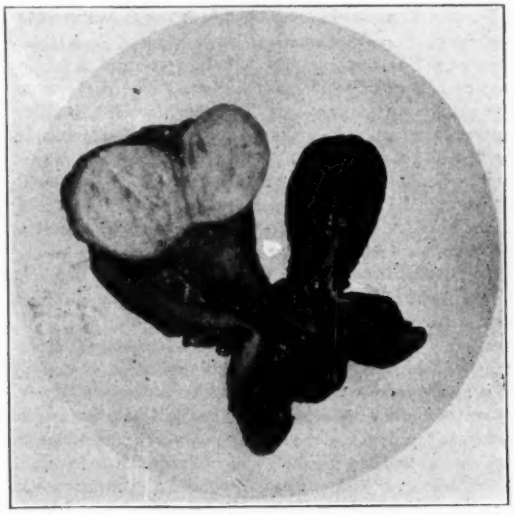
Dr. A. Schwyzer reported two cases, one of carcinoma of the stomach, the other carcinoma of the uterus, both operated and treated with radium.

DISCUSSIONS

Dr. Collins (Duluth): I feel as though my experience along this line is very limited compared with that of the men in the Twin Cities. I can distinctly remember the case of a man I saw some years ago. He operated a lumber yard and was in thriving circumstances up to the time he came under my observation, at which time he had symptoms of a gastric carcinoma. We went over him carefully and finally decided to do an exploratory operation. At operation we found both walls of the stomach involved with carcinoma and about the same involvement in both, each about three and one-half inches in diameter. I remember searching over the surface of the liver and finding no involvement. I did no further operation except to close him up. I told him quite frankly what the situation was and he closed up his affairs and went to California. About a year afterward I heard from him and he had been touring all over California. About fourteen months after the exploration he died. I feel justified in leaving this growth alone. We have seen two or three not quite so extensive as this since that time. I did do an extensive resection and lost one case after two or three months.

Dr. Schwyzer mentioned the fact that the blood supply was insufficient in the remnant of stomach left after resection. It occurred to me that it was possible to increase the circulation of the remaining stomach wall by scarifying and bringing the omentum around it and anchoring to encourage adhesions.

Dr. Magie (Duluth): The doctor's first case brought to my mind a case I had about twenty years ago. It has



Bicornate uterus removed by vaginal hysterectomy (Ritchie).

occurred to me since, if it is not possible for carcinoma to die. I don't see any reason why occasionally they might not die out from natural causes within themselves. I had a case of carcinoma of the stomach involving the lower end, or pylorus. After opening the abdomen, I found it was inoperable and did a gastroenterostomy. The man got well and lived for more than two years afterwards, to my knowledge, and as far as the tumor was concerned, it disappeared entirely.

The thought comes to my mind if it is not possible occasionally for these tumors to die out. I have had surgeons

tell me that they have had similar experiences with patients who were suffering with cancer of the stomach.

Dr. Coventry (Duluth): I speak largely on the question of radium in Dr. Schwyzer's case of carcinoma of the uterus. If you go over the literature you will find the mortality rate in cases of cancer of the uterus after five years, which have been operated, is approximately from 85% to 90%. We are switching from the operative procedure and going over to radium. We have given as much as 9,600 mg. in one dose, and it is remarkable the way these cases shrink down until no ulceration or visible evidence of cancer is apparent. I might criticize one point: The doctor says he uses the cautery and then uses radium. Then he does not know which is doing or has done good, the radium or the cautery.

At a recent meeting I heard Dr. Crile and his associates discuss this subject, and for the last year and a half they have been refusing to operate all cases of carcinoma of the uterus except carcinoma of the body of the uterus, and are using radium and *x*-ray in other cases of carcinoma of the uterus. The outcome of this will be most interesting to compare the mortality rate from the operative and radium standpoints. The case he reports having treated with radium I would not now attempt to operate.

Dr. H. B. Sweetser: I think that Dr. Schwyzer is right in refusing to operate on a carcinoma of the uterus which has receded as this one has, following his application of cautery and radium. Some years ago I had occasion to look up this very subject, and Dr. Lynch, of San Francisco, reported a patient upon whom he had used radium with the result that his case, which was inoperable, became apparently operable. He then did a radical operation, and found active foci of carcinoma which had apparently been held in abeyance far out in the broad ligaments, and apparently his operation lighted up an active process, inasmuch as his patient died shortly afterwards from a recurrence. Radium, as we know, has a penetrating influence over a not very large area, and Percy claims that the dull heat which he uses has a far greater penetration than radium. I agree with Dr. Schwyzer that the combined application of cauterization with radium is better than either alone, and this is the method which we use. I have one patient who is still free from recurrence four years after removal of the uterus with cautery and the application of radium. I have another patient who is well three years after such treatment. I do not think we can get better results than this by a radical operation. We can never be sure how widespread the carcinomatous process is, and cutting through apparently healthy tissues may result in disaster. Our radiologist advises that a cautery should be used, and that radium be applied immediately following such cauterization.

Dr. F. A. Dunsmoor: I would say first of all, that in my opinion it is only those cases which have no glandular involvement that promise us any hope for a complete cure, and that the only operation which should be made where there is glandular involvement is that made for temporary relief, like an intestinal anastomosis for obstruction.

I am also convinced that the application of the actual cautery is much more likely to produce a cure than the use of the Percy method.

In Dr. Schwyzer's case I certainly endorse his opinion as to the sound judgment exhibited when he used the radium instead of resort to hysterectomy in such an extreme case.

In answer to the doctor's question as to an opinion regarding the cause of the slough or necrosis in the stomach following the removal of the cancerous growth, will say, it is quite possible that the incision for the anastomosis on the anterior surface of the stomach may have shut off some of the blood supply at the site of the original operation and Dr. Schwyzer may have gotten a better result had he made his anastomosis on the posterior side of the stomach.

Dr. E. S. Judd (Rochester): Dr. Schwyzer, in reporting these cases, has brought up some interesting and important points. The question as to whether radium or the cautery will ever convert an inoperable condition into an operable one was brought out both in the case of malignancy of the stomach and that of carcinoma of the cervix. Our experience makes us feel that if we start to treat malignancy by radiation or the cautery, it is probably better to continue with that line of treatment than to institute any surgery.

The stomach case was interesting, though it is probably similar to cases reported previously. In a few instances we have made an exploratory incision and found what we thought to be an inoperable malignancy of the stomach, and had the patient live a considerable time afterwards—long enough so that we questioned that the lesion was really malignant. I doubt very much whether the change produced by radium would make the condition operable, and that the man could be benefited by removing the lesion at this time. I doubt very much from Dr. Schwyzer's description but that his case was malignant.

When we first began to treat malignancy of the cervix with the cautery, we had the patient come back later, after the ulcerated and burned surface had healed and at that time removed the remainder of the uterus by a total abdominal hysterectomy. We have also carried out this procedure in quite a number of cases in which the malignant ulcerating surface had been healed over after the use of radium. In the first place we often found that there was no demonstrable evidence of malignancy in the uterus after the carcinoma of the cervix had been destroyed by the radium. This, however, did not mean that the malignancy had been eradicated as it frequently sprung up later in the lymphatics. It therefore seemed that we were operating on these cases unnecessarily. We also found that the abdominal operation was difficult to perform as it was necessary to expose the ureters and the base of the bladder.

As I stated before, I think our experience rather justifies our feeling that it is seldom, if ever, that the inoperable lesion is converted into an operable one by radium or *x*-ray.

Dr. A. T. Mann reported a case of ulcerating carcinoma of the right breast.

Mrs. T., about 47. (Operated five years ago, still living). Cancer paste had been used on her by a quack and when I saw her first she had a raw red granular mass 2 by 2½ inches in the upper outer quadrant, reaching across the midline of the breast. The mass of the tumor seemed to extend into the breast tissue about three-fourths of its thick-

ness. The axillary glands were palpable, but not large. It seemed almost a forlorn hope to operate her. A complete breast operation was done, however, five years ago. There were secondaries in the axillary glands and in one close below the clavicle against the main vein where it runs through under the clavicle. Microscopic examination showed an adeno-carcinoma. She healed nicely. She was given a course of *x*-ray and radium treatment. About one year later small secondaries appeared at or near some of the stitch-marks, from pin-head to a little larger in size. She was again given a course of *x*-ray and radium. The nodules disappeared and she remained well for over a year and a half, when they again appeared and were again treated as before. About nine months ago two or three very small ones appeared in the same place. These were again treated and disappeared. At the present time she is apparently well. After the second *x*-ray and radium treatments distinct edema of the arm of a moderately good size showed up, though she had had a slight edema before. This has grown somewhat better but still persists.

How long she may stay well, or whether further secondaries may come, I do not know. Now at the five-year period she seems well.

The *x*-ray and radium do not kill all the cancer cells. They kill some of the cells and they stop the growth of others. These weakened cancer cells no doubt become hedged in by scar tissue. Some of these weakened cells may be so hemmed in by the scar tissue that they are not able to go on increasing but lie more or less dormant. Other groups of them, after a longer or shorter period of time, months or years, gradually gain enough vitality to become active, to grow into and through this tough surrounding scar tissue and show up as late secondary cancer growths. Further radium and *x*-ray treatments repeat the periods of the death of some of the cancer cells and the stunted and retarded growth of others. This explains the necessity of keeping the cases under long periods of observation so that if these secondary growths start to grow they may be seen and the treatment may be repeated so that there may be another period of quiescence, but also with the hope that finally the growth may be stopped altogether. What has been said about the weakened vitality of some of the cancer cells after treatment and their later encystment in scar tissue, explains the reason why a late secondary operation may start a rapid and unexpected growth of the cancer which may be disastrous to the patient, by cutting through some of these scar areas and liberating a few cancer cells into fresh tissue where they can have abundant nourishment and grow with great vitality.

DISCUSSIONS

Dr. H. B. Sweetser: I assume that Dr. Mann believes, as we all do, that radium inhibits cancer cells, and in this connection I would like to relate an experience in a case where radium was not used.

Twelve years ago I operated upon a woman for cancer of the breast, and she remained without recurrence until about two years ago. At that time, coming downstairs she bumped the scar against the newel post, and very shortly a cancerous nodule appeared in the scar. My query is—were cancer cells there from the time of the primary operation, which had become encysted in the scar tissue and had remained latent, and did the trauma stimulate these dormant cancer cells which might have been there? Or was this a new cancer occurring in a patient with a predisposition, coming there as a result of the trauma?

Dr. L. C. Bacon: A case which I saw many years ago may help to answer Dr. Magie's question "Whether cancer cells die?" A woman came to me with a large nodule under the pectoral margin in the right axilla. She gave me a history of having a lump in the breast some months before and that the lump had disappeared. At operation the mass in the axilla gave the impression of being a carcinomatous lymphatic and the fact that there were many lymphatics made me quite certain, and I removed the breast at the same time. The pathological examination showed that the nodules in the axilla were cancerous, but that the breast was absolutely free from cancer cells. At the outer portions of the breast we found some scar tissue, but at no place in the breast were we able to find any carcinomatous cells. The cancerous growth in the axilla must have originated in the adjacent breast and it is quite certain that the primary growth had disappeared.

Dr. A. E. Benjamin reported the following case:

I wish to report a case of interest. A child 8 years old who came with a history of having abdominal pains for six months with ascites gradually developing to such an extent that the abdomen was very tense. Patient was very anemic, vomiting considerably, bowels alternating between diarrhea and constipation, with some enlargement of the right testicle, and *x*-ray showing great dilatation of coils of intestine and a shadow—possibly an enlarged spleen. A large area of dulness showed that the spleen was enlarged.

It was apparent that owing to the obstruction of the bowels something had to be done. Pre-operative diagnosis was possible sarcoma of the spleen with ascites.

Operation was done to drain off the fluid and relieve obstruction. We found a spleen four or five times normal size, with many adhesions throughout the intestines, and bloody serum. Part of the omentum was removed for diagnostic purposes and some adhesions broken up and a drain left in. I gave the parents an unfavorable prognosis. Deep *x*-ray therapy of 200,000 volts in three treatments was employed. The operation was about two months ago and the *x*-ray treatment followed shortly after that. Two weeks ago I saw the child with a much changed appearance. He was a little anemic, but the abdomen had flattened out almost entirely. He was eating three meals a day. He still complained, however, of pain over the right testicle which was considerably enlarged and tender. We operated and removed what appeared to be, macroscopically, a sarcoma, and microscopically was found to be round-celled sarcoma. The child did very well and went home in about a week's time and apparently in perfect condition.

I don't think I have ever seen such a change in the appearance of a patient in so short a time, but I cannot hold out a very favorable prognosis. I think that metastatic growths are likely to occur in other parts of the body, and would like to know if that is the opinion of others here.

PHYSICIANS LICENSED AT THE JUNE (1923) EXAMINATION TO PRACTICE MEDICINE IN THE STATE OF MINNESOTA

By Examination

Name	*School and Date of Graduation*	*Address*
Alberts, Max Wm.	U. of Minn., M.B., 1923	St. Joseph's Hospital, St. Paul
Anderson, Arnold Sibert	U. of Minn., M.B., 1923	Milan, Minn.
Anderson, John Gordon	Harvard, M.D., 1921	Rochester, Minn.
Backe, Irma	U. of Minn., M.B., 1923	Kenyon, Minn.
Blumenthal, Jacob	U. of Minn., M.B., 1923	1901 Elliot Ave. So., Minneapolis
Branham, Donald Stark	U. of Minn., M.B., 1923	509 Forest Ave., Minneapolis
Carlson, Herbert Austin	U. of Minn., M.B., 1923	General Hospital, Minneapolis
Endres, Wm. Jos	U. of Minn., M.B., 1923	203 Buckingham Hotel, Minneapolis
Erickson, John L.	U. of Minn., M.B. and M.D., 1923	Twin Valley, Minn.
Frawley, John Milan	McGill, M.D., 1919	Rochester, Minn.
Gamble, Paul Middleton	U. of Minn., M.B., 1923	Ancker Hospital, St. Paul
Ginsberg, Harry	U. of Minn., M.B., 1923	1608 11th Ave. S., Minneapolis
Gronvall, Paul Russell	U. of Minn., M.B., 1923	2515 10th Ave. S., Minneapolis
Harmon, Gaius Edward	U. of Minn., M.B., 1923	Ancker Hospital, St. Paul
Heck, Wm. Wilfred	U. of Minn., M.B., 1923	613 North St., St. Paul
Hullsiek, Richard Benj	U. of Minn., M.B., 1923	161 Macalester Ave., St. Paul
Holt, John E.	U. of Minn., M.B., 1923	2542 Chicago Ave., Minneapolis
Holt, Wm. Brayton	U. of Minn., M.B., 1923	Cleveland, Ohio
Kokatnur, Gundu R.	U. of Minn., M.D., 1922	Baltic, Mich.
Levin, Bert G.	U. of Minn., M.B., 1923	907 W. Franklin, Minneapolis
Madsen, Leo John	U. of Minn., M.B., 1923	2215 Lyndale Ave. N., Minneapolis
March, Kenneth Alan	U. of Minn., M.B., 1923	203 Buckingham Hotel, Minneapolis
Monroe, Paul Burns	U. of Ill., M.D., 1923	Soudan, Minn.
Morris, Francis Jos	Rush, M.D., 1923	Proctor, Minn.
Morrow, Jas. Jos.	U. of Minn., M.B., 1923	Phys. & Surg. Bldg., Minneapolis
Olson, Ernest Alvin	U. of Minn., M.B., 1923	General Hospital, Minneapolis
Peterson, Marvin Garfield	U. of Minn., M.B., 1923	General Hospital, Minneapolis
Rosenfield, Abraham Benj.	U. of Minn., M.B., 1923	General Hospital, Minneapolis
Scodel, Bension	Tufts, M.D., 1921	Lowry Bldg., St. Paul
Souster, Benj. Bruce	U. of Minn., M.B., 1923	Ancker Hospital, St. Paul
Stephens, Erwin Edward	U. of Minn., M.B., 1923	Garrison, N. D.
Stratte, Alf. Kenneth	U. of Minn., M.B., 1923	St. Francis Hospital, Pittsburgh, Pa.
Strunk, Clarence Alfred	U. of Minn., M.B., 1923	General Hospital, Minneapolis
Urbahns, Robert Durfee	U. of Minn., M.B., 1923	4416 Abbott Ave. S., Minneapolis
Weber, Mandel Leu	Moscow Univ., 1919	Nopeming, Minn.
Whitcomb, Elmer Wm.	U. of Minn., M.B., 1923	University Hospital, Minneapolis
Williamson, Carl Sneed	U. of Pa., M.D., 1920	Rochester, Minn.
Wilmot, Harold Eugene	U. of Minn., M.B., 1923	St. Charles, Minn.
Wold, Alvin Pontus	U. of Minn., M.B., 1923	783 Fairmount, St. Paul
Zlatkovski, Michel Leibovich	Kiev, Russia, 1913	917 East 5th St., Duluth

Through Reciprocity

Becker, Samuel Wm.	U. of Mich., M.D., 1921	Rochester, Minn.
Cobb, Donnell B.	U. of Pa., M.D., 1921	Rochester, Minn.
Delamere, Granville Sinclair	U. of Calif., M.D., 1921	Rochester, Minn.

Dixon, Claude Frank.....U. of Kansas, M.D., 1921.....Rochester, Minn.
Kilfoy, Edward Joseph.....St. Louis U., M.D., 1922.....Rochester, Minn.
Lyday, Russell Osborne.....U. of Pa., M.D., 1920.....Rochester, Minn.
Sturges, Chester Jas.....U. of Iowa, M.D., 1922.....Buffalo, Minn.
Tuttle, Thos. D.....P. & S., N. Y., M.D., 1892.....Aberdeen Hospital, St. Paul

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PHYSICIANS LICENSED AT THE OCTOBER (1923) EXAMINATION TO PRACTICE MEDICINE IN THE STATE OF MINNESOTA

By Examination

Name	*School and Date of Graduation*	*Address*
Berdez, Georges Louis	Lausanne, 1914	St. Mary's Hospital, Duluth
Davidson, Thorald Edward	Rush, 4 yr. Cert. Med. 1923	Ancker Hosp., St. Paul, Minn.
Feeney, John Matthias	N. W. 4 yr. Cert. Med. 1923	Ancker Hosp., St. Paul, Minn.
Houck, Knut Hoegh	N. W., M.D., 1922	221 5th Ave. N. W., Rochester
Kjos, Clarence Eugene	Rush, 4 yr. Cert. Med. 1923	Ancker Hosp., St. Paul, Minn.
Rohwer, Christian Jacob	U. of Pa., M.D., 1921	Mayo Clinic, Rochester, Minn.
Spaulding, Olive G.	U. of Pa., M.D., 1921	Mayo Clinic, Rochester, Minn.
Tregilgas, Harold Richard	N. W., 4 yr. Cert. Med. 1923	Ancker Hosp., St. Paul, Minn.

Through Reciprocity

Adams, Leon P	Marquette, M.D., 1923	Rosemount, Minn.
Bargen, Jacob Arnold	Rush, M.D., 1922	Rochester, Minn.
Boysen, Herbert	U. of Ia., M.D., 1922	511 21st St., Sioux City, Ia.
Callahan, Francis Fowler	U. of Md., M.D., 1913	Pokegama, Minn.
Collins, Harry Aloysius	Creighton, M.D., 1922	Rochester, Minn.
Comfort, Mandred Whitset	U. of Tex., M.D., 1921	Rochester, Minn.
Cook, Jay Milton	Creighton, M.D., 1922	Staples, Minn.
Crane, Wm. Whitfield, Jr.	Stanford U., M.D., 1922	Rochester, Minn.
Davis, Austin Clifford	U. of Ia., M.D., 1916	201 9th Ave., Rochester, Minn.
Dorsey, Geo. Chas.	N. W., M.D., 1921	310 Hulet Block, Minneapolis
Espenlaub, Geo. Henry	Ind. U., M.D., 1922	Rochester, Minn.
Fossum, Cornelius	Loyola U., M.D., 1919	Moose Lake, Minn.
Huffman, Lester Dale	Ind. U., M.D., 1916	Rochester, Minn.
Keiser, Venice Duncan	U. of Ind., M.D., 1917	519 6th St. S. W., Rochester, Minn.
Leech, Chas. Hoyt	U. of Cin., M.D., 1922	825 5th Ave. S. E., Rochester, Minn.
Marquis, W. James	Harvard, M.D., 1922	Rochester, Minn.
Marsh, Fred Eugene	Vanderbilt, M.D., 1922	518 5th Ave. S. W., Rochester, Minn.
Mentzer, Stanley Herman	U. of Cal., M.D., 1923	Rochester, Minn.
Morse, Harry Dodge	McGill, M.D., 1918	Rochester, Minn.
Nixon, Samuel Henry	Med. Coll. Va., M.D., 1920	Rochester, Minn.
Offutt, Susan Rebecca	U. of Pittsburgh, M.D., 1919	Rochester, Minn.
Parson, Lester Raymond	Rush, M.D., 1922	Elbow Lake, Minn.
Raiter, Roy Ferdinand	N. W., M.D., 1923	Cloquet, Minn.
Stinson, John Wesley	Jefferson, M.D., 1921	Rochester, Minn.
Webber, Isaac Mervyn	Bowdoin, M.D., 1920	Rochester, Minn.
Yoakem, Howard Haynes	Ohio State U., M.D., 1921	Rochester, Minn.

National Board Credentials

Bothe, Frederick Augustus	U. of Pa., M.D., 1921	Rochester, Minn.

BOOK REVIEWS

BOOKS RECEIVED FOR REVIEW

INTERNATIONAL CLINICS. A quarterly of illustrated clinical lectures and especially prepared original articles by leading members of the medical profession throughout the world. Edited by Henry W. Cattell, A.M., M.D., Philadelphia, in collaboration with others. Volume III, 33rd series, 1923. Philadelphia and London: J. B. Lippincott Co.

BLOOD CHEMISTRY COLORIMETRIC METHODS. Willard J. Stone, M.D., Pasadena, Calif., attending physician Los Angeles General Hospital. Introduction by George Dock, M.D., Pasadena. 75 pages. New York: Paul B. Hoeber, Inc., 1923. Cloth, $2.25.

DIAGNOSTIC METHODS. Herbert Thomas Brooks, A.B., M.D., F.A.C.P., Professor of Clinical Medicine, College of Medical Evangelists, Los Angeles; formerly Professor of Pathology, College of Medicine, University of Tennessee, Memphis, Tenn. 4th edition. 109 pages. 52 illustrations. St. Louis: C. V. Mosby Co., 1923. Cloth, $1.75.

MENTAL DISORDERS. Francis M. Barnes, Jr., M.A., M.D., Associate professor of Nervous and Mental Diseases in the St. Louis University Medical School; neurologist to St. Mary's Hospital; consultant neurologist to St. John's Hospital; consultant psychiatrist to the St. Louis City Sanitarium; consultant neuropsychiatrist to the U. S. Veterans' Bureau, Ninth District, St. Louis. 2nd edition. 295 pages. St. Louis: C. V. Mosby Co., 1923. Cloth, $3.75.

DISEASES OF THE SKIN. Richard L. Sutton, M.D., LL.D., Professor of Diseases of the Skin, University of Kansas, School of Medicine; former chairman of the Dermatological Section of the American Medical Association; Assistant Surgeon U. S. Navy, retired; dermatologist to the Christian Church Hospital. 1214 pages. 1069 illustrations. 11 colored plates. 5th edition, revised and enlarged. St. Louis: C. V. Mosby Co., 1923. Cloth, $10.00.

THE NOTE BOOK OF AN ELECTRO-THERAPIST. By Mel. R. Waggoner, M.D. Published by McIntosh Electric Corporation, Chicago, Ill. Price $5.00.

The first chapter deals with some of the principles of physics involved in the use of high frequency, sinusoidal, faradic and galvanic currents. Also a discussion of the principles of phoresis.

Chapter II is on the different phases of electro-therapeutics with indications and contra-indications for use of same.

The remaining chapters are on treatment of individual diseases. Here the author describes his personal technique.

In order that physical remedies may be intelligently used, one must have good knowledge of the principles of physics, physiology, pathology and anatomy involved. The equipment must be of high grade or harm may be done. There is also a danger of becoming over-enthusiastic, since physical remedies like drugs are not cure-alls. Diathermia has already proven its value in increasing heat and blood supply to the part affected. Cataphoresis by galvanic currents is of somewhat doubtful value in deep tissues, since the ions travel slower than the blood stream and therefore are carried away before they can penetrate very deep. However, in superficial tissues, they may be used with some success.

A. M. LUNDHOLM, M.D.

A CLINICAL GUIDE TO BEDSIDE EXAMINATION. Dr. H. Elias, Dr. N. Jazic, Dr. A. Luger; translated by William A. Brams, M.D. First edition. 124 pages, with a foreword by the authors. Rebman Company, New York. Cloth, $1.50.

A small booklet which, in a systematic and logical sequence, endeavors to place before the physician methods of physical examination and the interpretation of the various findings. It is written in a very concise manner. Details of laboratory, graphic, or other methods not precisely clinical are all omitted, but references to them are given.

The chapters on lungs and heart are more intensively treated, although the findings here are those only of auscultation, percussion, palpation and inspection. Most welcome in these sections are the intepretations of cardiac and pulmonary phenomena, which are gone into much in the manner of an index, but still in a clear, concise and thoroughly understandable manner.

The relation of physical findings to prognosis is dealt with, but too little. One wishes for more of this sort of treatment.

The nomenclature is up to date and always exact. By an economy of words and concise classifications and explanations, the authors have succeeded in embodying in this small booklet an admirably practical guide to clinical diagnosis with much more real merit than is usually found in such books.

BURTON ROSENHOLTZ, M.D.

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Minnesota State Medical Association

ANNUAL MEETING

October 10, 11 and 12, 1923

ST. PAUL, MINNESOTA

MINNESOTA STATE MEDICAL ASSOCIATION MINUTES OF THE FIFTY-FIFTH ANNUAL MEETING HELD IN ST. PAUL, OCTOBER 10, 11 AND 12, 1923

PROCEEDINGS OF THE HOUSE OF DELEGATES

FIRST SESSION — WEDNESDAY, OCTOBER 10, 1923

The House of Delegates met in the Windsor Room of the Saint Paul Hotel, and was called to order by the President, Dr. E. Starr Judd, Rochester, 2 P. M.

THE PRESIDENT: The House of Delegates will please come to order. I will appoint on the committee to pass on the credentials of the delegates, Dr. Cameron, Dr. Giffin and Dr. Carroll.

Members of the House of Delegates:

I am grateful and thank you for the honor you have conferred upon me in electing me to an executive office in this society, and I realize the responsibilities I have assumed.

The membership of the State Medical Association is made up of physicians who are licensed to practice medicine in the State of Minnesota. The members of the House of Delegates are chosen as representatives of the various county societies, to review the activities of the Association for the past year and to formulate plans and policies for the future. All of the county societies in the state should realize the responsibilities of this body, and see to it that they are well represented.

With routine business cared for and the reports of committees received and acted upon, it is our purpose to bring up for discussion any new ideas or activities in which we may take part for the benefit of the citizens of our state. In reviewing the work being done by a number of similar organizations in other states, I have found that one of the principal activities is the formation of health committees or leagues for the extension of medical knowledge and the development of better contact with the lay people of the state. In our own state, we have a Statewide Publicity Committee, formed to carry out similar work. This committee is, I believe, too large and unwieldy to be of service or to function properly in specific matters. We also have our Legislative Committee, which has done most excellent work, and which should be continued under its present chairman. In addition, a number of the county societies, through special organizations, are carrying out work along these lines.

Educational committees and health leagues have been formed in other states, apparently because it seemed impossible to get good legislation in other ways, and it seemed to be the duty of the profession of the state to keep its citizens informed on medical problems in order to counteract the activities of the charlatans. Everyone who has made a serious study of these problems seems to agree that it is a matter of educating the general public in medical and public health problems, and that it is the duty of the profession, through the activities of its societies, to carry out such educational propaganda. Several plans were presented and discussed at a conference of state secretaries last year. In Michigan it was decided to establish a committee on public education, originated by the Michigan State Medical Association. The committee embraces in its membership representatives from the State Medical Association, the University of Michigan, including the Extension Department, its medical and hospital staffs, the State Department of Health, the State Dental Association, and the Detroit College of Medicine. Speakers are sent on request to any place in Michigan. The Extension Department of the University helps to pay the expense of these speakers. The committee has apparently just begun its work and it may be some time before the results of its activities are realized, but thus far, the members are very enthusiastic over what has been accomplished, both from the standpoint of publicity and the elevation of medical standards.

The second plan discussed at the conference of the secretaries, is in operation in Colorado and California, under the name of the Public Health League. This body acts as an intermediary between the Colorado State Medical Association and the public. The League is composed of lawyers, merchants, ministers, and physicians, the laymen being in the majority, and they are gradually becoming the most enthusiastic supporters of the movement. This league has functioned most satisfactorily for about one year.

The third plan was put into operation in Iowa, largely due to the activities of Dr. Macrae. There is a field activity committee, consisting of the president of the State Association, two members selected by the Council, one from the State Board of Health, one from the Faculty of Medicine of the University, one from the Iowa State Tuberculosis Association and one a state social worker. Thus the committee has seven members, five of whom are members of the State Medical Association. The problems undertaken are: (1) the distribution and delivery of medical service; (2) the adequate provision of good hospitals; (3) the establishment of county public health hospitals, and (4) the solution of health problems in schools. The Director of the Field Activities Committee devotes his whole time to the work. He has visited societies and clubs throughout the state, and up to the present time it is reported that he has discovered many matters of importance that need to be corrected. The expense of carrying on this work is great, and the activities of the committee have been limited by insufficient funds.

The fourth plan, a League for the Conservation of the Public Health of Idaho, is in operation in that state. The Secretary writes, "The League is somewhat different from the Medical Society in that it is larger in scope and handles problems that could not be touched by a medical society. In other words, the League takes care of the publicity, political and legislative end of the game, while the Society handles the scientific and ethical side." He feels

that the League has an advantage over a medical society since it may take part in all public health questions, and since the membership includes everyone interested in the betterment of public health, whereas the membership of a medical society is limited to medical men. As an illustration of the League's function, he cites the passage of the licensing law, concerning which there has been a misconception on the part of the public to the detriment of the medical profession. "Any public health law, and this includes the licensing law, is passed in the interest of the whole people; this has been held in hundreds of supreme court decisions. As a matter of fact, a law put through to benefit a certain profession or a class would be unconstitutional, and the supreme courts have held that all public health laws, while they have been fostered by medical men, are placed on the statute books for the benefit of the people. It is, therefore, one of our aims to interest the people in matters of this kind." There have been over 900 court decisions pertaining to licensing matters handed down by our various supreme courts. A misconception has arisen that the profession is doing this for their own benefit. The secretary of this league believes that their great work in the future will be to start health columns in the daily, weekly, and monthly papers, in order to give the public the benefit of the knowledge acquired by the medical profession. Under conditions of such complete frankness, there will naturally be a better understanding between the public and the profession. Active membership in the Idaho League is limited to medical men, and the secretary feels that the control of the League should be kept in their hands. The regular members pay a definite membership fee, while the associate members pay any sum they desire.

In an endeavor to actively relate public health to the welfare of the state, Governor Smith, of New York, invited representatives of the medical profession from every section of his state to act as an advisory committee to the governor, this committee to investigate and report on rural health conditions and facilities, medical education, medical research, the Medical Practice Act, and narcotic drug problems. The action of Governor Smith in bringing into existence such a committee was endorsed by the House of Delegates of the American Medical Association.

We all recognize the necessity of a closer relationship between the public and our profession, and a consideration of the foregoing plans would seem to indicate that more can be accomplished by organization than by endeavoring to demonstrate to state legislators the importance of what we are trying to do in the interests of public health. While these various projects for the purpose of obtaining better contact between the state medical association and its component societies, between the state association and the national organization, and between all of these and the public, have not been in existence long enough to justify a definite prognosis with regard to results, they nevertheless suffice to encourage further effort along these lines, not only by a few of the medical profession, but by all.

In view of the work being done in other states, it seems to me that we should lose no time in appointing a committee from among the members of the Minnesota State Medical Association to study the plans of the various organizations now in existence, and later to originate such an organization as may seem best suited to corresponding work in our own state.

THE PRESIDENT: The next order of business is the reading of the minutes of the last meeting.

THE SECRETARY: The minutes of the previous meeting of the House of Delegates were published in the February number, 1923, of MINNESOTA MEDICINE. One correction should be made in the initial of Dr. Bratrud. It should be T. Bratrud; it was an error in publication. Possibly some of the members have found some other errors. If not, we could dispense with the reading of the minutes if a motion to that effect be made.

DR. W. A. JONES: I move that the minutes be accepted as published. (Motion duly seconded and carried.)

THE PRESIDENT: The next order of business is the report of the Council, by Dr. Workman.

DR. H. M. WORKMAN: Mr. President, Members of the House of Delegates:

REPORT OF THE COUNCIL TO THE HOUSE OF DELEGATES

The Council in full attendance met this morning at 10 A. M. in the University Room of the Saint Paul Hotel. The reports of the secretary, treasurer, and MINNESOTA MEDICINE were read and accepted. The report of the certified accountant, Mr. Flesher, who has audited all the books of the Association, was read and approved and the recommendation made that this report be published with the proceedings of the House of Delegates.

A resolution was passed congratulating the Editing and Publishing Committee, the Business Manager, and the Editor on the fine character of the publication and particularly its business management.

Further recommendation to the House of Delegates was made that attention be called to the provision in the by-laws that the attorneys of the State Medical Association must be given "sole power to conduct the defense" in the matter of malpractice suits. It is believed by the Council that the attention of members of the Association should be called to the situation as it now exists whereby Association attorneys are called upon to assist the attorneys of insurance companies where outside insurance is carried by a member.

The question of the formation of a scientific section of Obstetrics and Gynecology was referred to the House of Delegates for action.

(Signed) H. M. WORKMAN,
President.

THE PRESIDENT: I will call for the report of the Editing and Publishing Committee by Dr. R. E. Farr of Minneapolis.

REPORT OF THE EDITING AND PUBLISHING COMMITTEE

Minneapolis, Minn., Oct. 10, 1923.

Mr. President, Members of the Council and Delegates to the fifty-fifth convention of the Minnesota Medical Association:

I herewith submit the sixth annual report of the Editing and Publishing Committee of MINNESOTA MEDICINE for the year beginning October 8, 1922, and ending October 10, 1923.

As a preliminary to the submission of this report, I take pleasure in calling your attention to the fact that MINNESOTA MEDICINE is just finishing its most successful year since its foundation. While the list of non-member subscribers is not large, our publication seems to be finding favor with an increasing number of physicians outside of the state. That the number of subscriptions received from outside the state is not large is, in my opinion, due to the fact that no special effort has been made to obtain these subscriptions. It is our intention to establish in the near future a subscription campaign throughout the bordering states.

Your committee feels proud of the fact that a high editorial character has been maintained since the publication was launched and that the advertising appearing in our journal has been most carefully censored so that every member of the State Association may feel proud of the journal on this account.

The material offered to our journal has become so abundant that careful selection is possible and necessary, thereby giving us an opportunity to publish articles which rank with the best. It is perhaps for this reason that our journal has recently been mentioned along with two or three other publications by a distinguished editorial writer as an ex-

ample of the great advance that has taken place in the recent evolution of medical journals.

As the report of the Treasurer is carefully itemized, I shall only present the totals in this communication. The expense of printing MINNESOTA MEDICINE for the year amounted to $10,352.08. Total receipts from MINNESOTA MEDICINE, including membership subscription credits, amount to $11,798.17, giving a net surplus of approximately $1,400.

I feel that this report would be incomplete without once more referring to the high editorial capacity of our Editor and Secretary, Dr. Carl B. Drake, whose untiring efforts and native ability have made the work of the Editing and Publishing Committee a pleasure rather than an arduous task.

And furthermore, I feel that a word of appreciation is due Mr. J. R. Bruce for the efficient management of our publication. His constant efforts at economy and his wise counsel regarding methods of increasing the income of the journal have been largely responsible for making it possible to present such a satisfactory financial report, all of which is respectfully submitted by

ROBERT EMMETT FARR,
Chairman of the Editing and Publishing Committee of MINNESOTA MEDICINE.

THE PRESIDENT: What will you do with the report of this committee?

DR. F. R. WEISER: I move that it be accepted and placed on file. (The motion was duly seconded and carried.)

THE PRESIDENT: We will now have the secretary's report.

REPORT OF THE SECRETARY

One thousand eight hundred ninety-three physicians have been enrolled as members of the Minnesota State Medical Association since the last annual meeting. One thousand eight hundred eighty-nine of these are paid members and four have been received by transfer from other states. Nine members, who had paid dues for 1923, have died during the year, leaving a net active membership at the present time of 1,884, apportioned to the component societies as follows:

Aitkin County	6
Blue Earth County	30
Blue Earth Valley	27
Camp Release	43
Central Minn. District (1 deceased)	6
Chisago-Pine	13
Clay-Becker (1 deceased)	21
Dodge County	9
Freeborn County	15
Goodhue County	15
Hennepin County (3 deceased)	451
Houston-Fillmore	23
Kandiyohi-Swift	18
Lyon-Lincoln	17
McLeod County	17
Meeker County	10
Mower County	22
Nicollet-Le Sueur	16
Olmsted County	232
Park Region	39
Ramsey County (2 deceased)	298
Red River Valley (1 deceased)	44
Redwood-Brown	31
Rice County	24
St. Louis County	172
Scott-Carver	18
Southwestern Minn.	49
Stearns-Benton	42
Steele County	16
Upper Mississippi	58
Wabasha County	13
Waseca County	12
Washington County	14
Watonwan County	7
West Central	22
Winona County (1 deceased)	21
Wright County	13
Total net membership (9 deceased)	1,884
Grand total	1,893

Last year's report showed a total membership of 1,815 members, leaving a net gain, for the year, of 78. This is a smaller gain in membership than was recorded for 1922. This is accounted for, no doubt, by the fact that the number of physicians in the state not members of the society is growing less each year. Estimating that there are approximately 2,500 physicians in the state, we now have 76 per cent of this number as members of the society. It is doubtful whether any other state medical society can show a better record.

Notwithstanding the unusual expenditures for legal service during the year the society has made a net gain in cash receipts of $1,569.31. During the year another real estate mortgage bond amounting to $2,000.00 was purchased as an investment. This bond runs for three years at six per cent interest. The total net assets of the society at the close of the year, October 10, 1923, amount to $14,320.27 and there are no liabilities.

The Secretary wishes to call attention to the following:

First—The county societies are the backbone of the organized profession. The county society, today, is suffering from the existence of too many medical meetings, notably those of the hospital staffs. County society meetings are showing a tendency towards becoming more political than scientific conferences. The remedy is a greater activity on the part of the officers of the county society, particularly in the arranging of interesting scientific programs.

Second—The number of malpractice suits has noticeably increased the past few years out of proportion to the increase in Association membership. The expense of the legal defense suits instituted against members has amounted this year to $2,683.71, this being $1,271.62 more than last year. Members are in the habit of calling on the Association attorneys for legal assistance even when they carry other insurance. This is like the patient demanding medical consultation as soon as he becomes ill. Representatives of insurance companies have stated that the employment of too many attorneys has the contrary effect to what is desired; that it arouses prejudice in the minds of the jurors by too great display of legal strength. It is suggested that the Association attorneys be called upon only on request of the attorney representing the insurance company or when the member has no other insurance.

Third—The Secretary's office frequently receives requests for assistance in suppressing illegal practitioners of medicine in the state. The State Association has no department for prosecuting illegal practitioners. The State Board of Medical Examiners, while having the right to institute proceedings, has not the personnel or means of prosecuting all offenders. Such proceedings may be instituted by individual physicians or by the local county society when proof of illegal practice is obtained. Proof in a specific case is the first essential and such proof should be referred to the local county attorney with the request that legal proceedings be instituted.

The system of handling the detail work of the Association through an executive secretary, which was initiated three years ago, has worked out very satisfactorily. The volume of the work has increased rapidly, due to the increased membership and the greater Association activities. The records are kept in a methodical and careful manner and the executive secretary, Mr. Bruce, and his assistants, Miss Seibert and Mrs. Hall, are to be commended for their interest and efficiency.

Respectfully submitted,

CARL B. DRAKE,
Secretary.

THE PRESIDENT: You have heard the secretary's report. Are there any comments or action to be taken on it? (Upon motion duly made, seconded and carried, the report was accepted.)

THE PRESIDENT: Is the Credentials Committee ready to report?

DR. CAMERON: I think there are a few delegates that came in that have not turned in their credentials.

THE PRESIDENT: While we are waiting we will have the report of the Treasurer.

REPORT OF THE TREASURER

DEBIT

Cash on hand October 8th, 1922	$ 3,903.44	
N. P. Bonds	4,000.00	
Real Estate mortgage	2,700.00	
Membership dues	9,575.00	
Received account MINNESOTA MEDICINE	8,012.17	
Received interest on bonds	160.00	
Received interest mortgages	189.00	
Received interest on daily bank balance	93.70	
		$28,633.31

CREDIT

Publication MINNESOTA MEDICINE	$10,352.08	
Legal expense	2,683.71	
Salaries	1,450.00	
Convention expenses	728.32	
Legislative committee	481.22	
Council	170.02	
Sundries (including postage, stationery, office supplies, circular letters, etc.)	595.21	
Real estate mortgages, 6 per cent	4,700.00	
N. P. bonds	4,000.00	
Money in bank, October 10th, 1923.	3,472.75	
		$28,633.31

(Upon motion, duly made, seconded and carried, the report was accepted.)

THE PRESIDENT: Next I will call on Mr. Bruce, the Business Manager of the MINNESOTA MEDICINE, to report on the activities of MINNESOTA MEDICINE for the last year.

DR. J. R. BRUCE: Mr. President and Gentlemen: I have not very much to add to what Dr. Farr reported except the statement of the receipts and disbursements on account of MINNESOTA MEDICINE.

MINNESOTA MEDICINE

MINNESOTA MEDICINE has closed a very successful year notwithstanding the general business depression which has prevailed throughout the country and more particularly in our northwestern states. The general business condition has undoubtedly affected the volume of advertising receipts, although a fair volume has been maintained. This is a condition which has affected all classes of publications and advertising in general and is likely to continue to do so until business is on a more stable basis.

While the journal is able to show a very nice surplus for the year, it is certain that this could be very materially increased were the advertising rates advanced in proportion to the service which we feel that the journal renders. In the face of the conditions which have prevailed for the past two or three years, however, it has not been thought advisable to make a change.

REPORT FOR THE YEAR

MINNESOTA MEDICINE RECEIPTS

Money remitted for subscriptions from October 14, 1922, to October 10, 1923	$ 330.75
Money remitted for advertising	7,681.42
Subscription credit—1,893 members at $2.00	3,786.00
27 members in arrears at $2.00	54.00
Accounts receivable, advertising, October 10, 1923	1,861.52
Total	$13,713.69

MINNESOTA MEDICINE DISBURSEMENTS

Printing expense	$ 4,136.00
Paper stock	1,271.55
Bruce Publishing Company, commission on advertising for twelve months	1,682.44
(The Bruce Publishing Company is allowed a commission of 30 per cent on all advertising obtained direct and 5 per cent on all advertising obtained through the Co-operative Medical Advertising Bureau.)	
Special stenographic fee	535.00
Actual postage for mailing of magazines, telephone, telegrams, etc.	311.00
Envelopes for mailing	142.67
Editorial expense, including editor's salary, newspaper clippings and illustrations	2,258.52
Miscellaneous	44.90
Accounts receivable, October 5, 1922	1,920.69
Total	$12,272.77
Net gain for the year	$ 1,440.92

J. R. BRUCE,
Business Manager.

THE PRESIDENT: You have heard the report of the activities of MINNESOTA MEDICINE the last year. All in favor of accepting it say aye. Contrary. The report is accepted.

The report of the attorneys will be read by Dr. Drake.

ANNUAL REPORT OF ATTORNEYS

October 5, 1923.

Dear Dr. Drake:

You have requested it, and we make report to the Association covering the work done by us during the year last past.

Hanson as Admr. v. Schlutz, et al. This action is pending in Hennepin County and is brought against Dr. Frederick W. Schlutz and Dr. F. H. Poppe and the Asbury Hospital to recover damages on account of the death of Lillian Hanson, a child, following an operation for pleural empyema.

Preston v. Schneider. The alleged malpractice in this case is an *x*-ray burn of the abdominal wall in the course of treatment of fibroids of the womb. There has been dismissal of the case on the merits and nothing was paid by the defendant.

Brewster v. Beals. The alleged malpractice in this case is in the reduction of a serious fracture (Colles) of the wrist and hand. The action has been disposed of on the merits and nothing was paid by Dr. Beals.

Flynn v. O'Hara. The charge of malpractice in this case is in producing lacerations with resulting infection in the treatment of Manda Flynn in childbirth. There was a verdict in favor of Manda Flynn in the sum of $1,600 and this verdict is being reviewed on a motion for a new trial. It is morally certain the verdict will be set aside by the court as not sustained by the evidence.

Backlund v. Frank E. Burch and Charles E. Connor. The alleged malpractice in this case is in severing the facial nerve or its branches resulting in facial paralysis in mastoiditis. The action is still pending and undisposed of.

Godtland v. Stewart. The alleged malpractice in this case is in advising and permitting the administration of chloroform in the extracting of teeth, the condition of the patient being such that only nitrous oxide could be administered, resulting in the death of the patient. Two cases are pending, one covering the death case, and the other the loss to the husband, and expenses.

Martinson v. Dr. Egil Boeckmann. Action in the District Court of Ramsey County. The claimed malpractice con-

sists in leaving within the lung cavity gauze and a safety pin and in failing to remove it, all resulting in the death of the patient. Counsel for the plaintiff has notified us that he will dismiss the case as to Dr. Boeckmann, leaving i pending against the Saint Paul Hospital.

Bahr v. Withrow. This action is pending in Koochiching County. The claimed negligence is in applying too tight a bandage in reducing a fracture of the elbow joint of a child. Besides ankylosis and deformity of the arm, the child suffered general infection of the arm. The arm is totally disabled. There was a verdict of $1,500, which is being reviewed on a motion for a new trial. The court has not given decision on the motion for a new trial.

Lampton v. Thornby. Action brought in the District Court of Clay County. The claimed negligence was in improperly reducing a Colles fracture. The court directed a dismissal on the merits.

Eastlund v. Cooney. Action brought in the District Court of Mille Lacs County. The claimed negligence consists in *x*-ray burns in fluoroscopic examination to determine the condition of the stomach. The court directed a verdict in favor of Dr. Cooney.

De Bernardini v. Dr. Vercellini and Geist. Action pending in District Court of Ramsey County. The claimed malpractice consists in improperly performing an abortion, resulting in profuse hemorrhages and general debility. Dr. Vercellini was merely the family physician and recommended the operation after consultation with Dr. Rothrock. The action will likely be dismissed as to Dr. Vercellini and stand for trial as to Dr. Geist.

Korman v. Hagen. Action pending in Waseca County. It is claimed that Dr. Hagen negligently fractured the child's arm in confining the mother. The action will be for trial in about two weeks.

Elofson v. Adkins. Action pending in the Federal Court at Fergus Falls. The claimed malpractice consists in the improper application of a cast on the leg and in not removing it, causing infection and gangrene, requiring amputation of the leg. The action will be for trial in November.

Walrath v. Hammermeister. The alleged malpractice in this case is in injecting ether into the leg of the patient, thereby causing injury to the sciatic nerve, leaving the patient in a crippled and paralyzed condition. The patient was suffering from pains in the leg. There is also a companion suit brought by the husband. The actions are still pending.

Krueger v. Bossingham. This action is still pending and is brought by the husband to recover certain expenses consequent upon the alleged malpractice in the treatment of his wife, who died from septicemia arising out of childbirth.

Singer v. Bossingham. This case is still pending, and the alleged malpractice is in failing to remove the afterbirth and in introducing a septic condition which resulted in focal infection with a crippled condition of the arm. We won the case on a trial thereof, but a new trial has been ordered.

Farr v. Burns and Folken. The claimed malpractice in this case is in failing to reduce a fracture of the neck of the femur. The action has been dismissed on the merits and nothing paid by the defendants.

Widman v. Lewis. The claimed malpractice in this case is in failing to discover and reduce fractures of the vertebrae. On the trial of the case the same was dismissed on the merits. Nothing paid by the defendant.

Rosenkranz v. Hengstler. It is claimed in this case that Dr. Hengstler negligently caused the death of Rosenkranz, his patient, by failing to surround the patient with proper sanitary conditions. The case was dismissed on the merits and nothing paid by Dr. Hengstler.

Johnson v. Cosgrove. The alleged negligence in this case is an *x*-ray burn in a fluoroscopic examination to determine the existence of ulcers of the stomach. The case has been dismissed on the merits and nothing paid by the defendant.

John v. Shipley (2 cases). Actions in the District Court of Mower County. The claimed malpractice is in introducing into the eye, eyeball and membranes some acid or foreign substance which severely burned the eyeball and membranes and impaired the sight. The actions will be for trial this month.

Johnson v. Urstad. Action pending in District Court of Hennepin County. The claimed malpractice is the failure of Dr. Urstad to perform an operation to relieve against pleural empyema. Counsel for Johnson has notified us that he will dismiss the case.

Marka v. Mankato Clinic. Action pending in the District Court of Blue Earth County. The claimed malpractice is in treating the patient for sciatic rheumatism and in negligently failing to diagnose that the patient suffered from osteomyelitis or arthritis of the left hip joint and thigh. Action will be for trial in November.

Costenoble v. Tanner. Action pending in the District Court of Hennepin County. The claimed malpractice consists in failing to diagnose diphtheria, from which the patient died.

Doran v. Mankato Clinic. Action in the District Court of Blue Earth County. The claimed malpractice is improper administration of an anesthetic and the patient died while under such influence. The case has been dismissed.

Hawkes v. Andrews. The claimed negligence is in leaving a sponge in the abdominal cavity in an operation for appendicitis.

In addition to the foregoing, there are some claims pending with threatened lawsuits.

Very truly yours,

OPPENHEIMER, PETERSON, DICKSON & HODGSON,
By Geo. W. Peterson.

THE PRESIDENT: The Credentials Committee report.

DR. J. A. CAMERON: Out of a possible fifty-seven we have forty-two credentials turned in. Before the meeting is over we will try to collect some more, if there are any.

The Committee on Credentials reported that 42 delegates had registered and were entitled to seats in the House of Delegates.

On motion, the report was accepted.

The following delegates constituted the House:

SOCIETY	DELEGATES
Blue Earth County	Dr. H. J. Lloyd, Mankato
Camp Release Dist.	Dr. E. M. Clay, Renville
Central Minn. Dist.	Dr. H. C. Cooney, Princeton
Chisago-Pine	Dr. Carlton G. Kelsey, Hinckley
Goodhue County	Dr. H. T. McGuigan, Red Wing
Hennepin County	Dr. A. S. Hamilton, Minneapolis
	Dr. L. A. Nippert, Minneapolis
	Dr. F. L. Adair, Minneapolis
	Dr. Kenneth Phelps, Minneapolis
	Dr. J. C. Litzenberg, Minneapolis
	Dr. Geo. D. Head, Minneapolis
	Dr. J. F. Corbett, Minneapolis
	Dr. W. A. Jones, Minneapolis
Houston-Fillmore	Dr. Cyrus B. Eby, Spring Valley
Kandiyohi-Swift	Dr. C. L. Scofield, Benson
McLeod County	Dr. J. B. Claire, Winsted
Mower County	Dr. R. S. Mitchell, Grand Meadow
Nicollet-Le Sueur	Dr. H. B. Aitkens, LeSueur Center
Olmsted County	Dr. D. F. Hallenbeck, Rochester
	Dr. H. Z. Giffin, Rochester
	Dr. A. H. Logan, Rochester
	Dr. W. A. Plummer, Rochester
	Dr. V. C. Hunt, Rochester
Park Region	Dr. A. C. Baker, Fergus Falls
Ramsey County	Dr. O. W. Holcomb, St. Paul
	Dr. W. C. Carroll, St. Paul

Dr. C. C. Chatterton, St. Paul
Dr. E. C. Eshelby, St. Paul
Dr. L. A. Hilger, St. Paul
Dr. J. A. Cameron, St. Paul
Red River Valley.....Dr. P. F. Melby, Thief River Falls
Rice County .....Dr. W. H. Theissen, Faribault
St. Louis County.....Dr. C. L. Haney, Duluth
Dr. W. A. Coventry, Duluth
Dr. O. W. Parker, Ely
Scott-Carver .....Dr. H. W. Reiter, Shakopee
S. W. Minnesota.....Dr. F. W. Metcalf, Fulda
Stearns-Benton .....Dr. W. L. Beebe, St. Cloud
Wabasha County .....Dr. D. S. Fleischhauer, Wabasha
Washington County .....Dr. J. W. Stuhr, Stillwater
West Central .....Dr. C. F. Ewing, Wheaton
Wright County .....Dr. L. Harriman, Howard Lake

THE PRESIDENT: What shall we do with the Attorneys' report? (Upon motion the report was acepted.)

THE PRESIDENT: Report of the American Medical Association Delegates, Dr. Bell of Minneapolis.

REPORT OF A. M. A. DELEGATES

The seventy-fourth Annual Session of the A. M. A. was held at San Francisco June 25th to 29th, 1923.

The House of Delegates met in the Civic Auditorium, June 25th, at 10 A. M., and was called to order by the speaker, Dr. F. C. Warnshuis. Full and complete stenographic reports of the meeting are given in the journal issues of June 30th, July 7th and 14th, 1923. Minnesota, in addition to its two delegates from this body, was represented by Dr. L. G. Rowntree, Delegate from the section of Pharmacology and Therapeutics, and Dr. W. F. Braasch, section of Urology. Speaker Warnshuis directed the deliberations of the House of Delegates in a manner tending to minimize friction and accelerate business. (The minutes of the last session were approved.)

The vice-speaker, Dr. Rock Sleyster, was called to the chair, after which Speaker Warnshuis delivered his address. He first called attention to the great loss sustained by the Association in the death of Dr. A. R. Craig, who had served the organization as its secretary for twelve years. Dr. Craig literally gave his life in unselfish labor to the Association. The speaker appointed a special committee to formulate suitable resolutions to be spread upon the records of the Association. The speaker called attention to the necessity of the House of Delegates devoting more time to the consideration of the business of the Association, and advised a midyear meeting; also advised the appointment of Reference Committees in advance of the annual meeting. Owing to the great expense attached to a midyear meeting, the House of Delegates did not approve the suggestion, but approved the suggestion that reference committees be appointed in advance of the annual meeting. The House approved the suggestion of the speaker that there was no demand or excuse for the entrance or continued activity of the Red Cross organization in the field of public health work, and recommended that the Board of Trustees so inform the officials of the Red Cross organization.

President de Schweinitz directed attention to the vexed problem of the undergraduate curriculum, especially the time which should be allotted the manifold specialties, and suggested that a special committee of the Council on Medical Education and Hospitals be appointed by the House to carefully investigate the entire subject.

President-elect Wilbur called attention to the necessity of the Association having a well-thought-out policy, one looking ahead at least a few years,—a most timely suggestion for our Association. He also called attention to the necessity of periodic physical examinations, in order that individuals may know their physical condition. This would afford an opportunity for the profession to bring directly home to the laity the benefit of scientific medicine.

Secretary Olin West reported the membership of the Association 88,519, a decrease of 529 members during the year, due largely to correcting the roster. The 2,049 component societies forming the various state societies represent 2,400 counties. The secretary reported a gain of 422 in the number of enrolled Fellows during the year, with 53,444 names on the roster May 1st, 1923. Some confusion apparently exists with respect to membership and fellowship. All members of State Associations are members of the A. M. A., but members desiring to become Fellows must make application, must subscribe for the journal, and pay dues for the current year. The dues and journal subscription amount at present to $6.00. Only Fellows are eligible for participation in the work of the Scientific Assembly, for election as delegates, or as officers of the Association. The Trustees reported an actual decrease in the circulation of the journal, due in part to the increased subscription price of $6.00.

Hygeia. The Minnesota State Medical Association, having urged the publication of a lay journal for several years, will be disappointed with the meager circulation to date. On the first day of May there were 19,500 subscribers, the vast majority being physicians who accepted the special offer made members of the profession.

The Trustees called the attention of the House of Delegates to a communication from Dr. Chas. E. Sawyer, requesting the appointment of an active committee to represent the Association at further conferences on the question of a National Welfare Department. In view of the fact that a Special Committee was appointed at the Boston meeting in 1921, the House instructed the speaker to appoint such additional members as he deemed advisable, preferably members residing near Washington. At the last Annual Meeting the Trustees were authorized to establish a Central Bureau of Legal Medicine and Legislation; this was done, and Dr. W. C. Woodward was placed in charge. This Bureau will doubtless enable the profession to keep more directly in touch with legislation, national and state. The Trustees requested that the Council on Health and Public Instruction be abolished, and that they be authorized to establish in lieu thereof a Bureau of Health and Public Instruction. Approved by the House.

The treasurer's report showed a reserve fund of $322,186.08, Dec. 31st, 1922.

The authors of both amendments to the constitution, proposed at the last annual session, seeking to restrict the powers of section delegates, requested the privilege of withdrawing same, which was promptly granted by the House of Delegates. For this fortunate outcome, Delegates Rowntree and Braasch deserve much credit.

The Judicial Council, in its report, called attention to the fact that the Board of Control of any hospital, not maintained by general taxation, has the legal right to refuse the privileges of the hospital at any time to any practitioner, regardless of his school of practice, also that the staff has the right to refuse as an associate any person it may consider objectionable.

Council on Health and Public Instruction called attention to the advisability of suitable blanks for the examination of persons supposedly in good health, and that county societies announce that their members are prepared to conduct such examinations.

The report of the Council on Medical Education and Hospitals dealt with: 1st. The progress during the year in medical education. 2nd. The problems in medical practice. 3rd. Graduate and postgraduate medical schools. 4th. Nurse education and service. The Council reported 81 medical schools, with a total enrollment of 16,140 students. The medical curriculum still continues to be an unsolved problem, and doubtless will so continue. However, the closer correlation between laboratory and clinical teaching is a decided gain. The Council expressed the opinion that 85 per cent of all cases of illness can be properly cared for by the qualified general practitioner, and 90 per cent of all

patients can be cared for in their homes. The Council estimated the number of Groups at 270—31 in Minnesota, and expressed the opinion, shared by the majority of the delegates, that Group medicine, properly organized, and ethically conducted, had a place in the field of medicine.

The House approved the recommendation of the Council that the list of approved Graduate Medical Schools be published. The Council devoted considerable time to the problem of the education and training of the nurse, and recommended that the question be referred to a joint committee of physicians and nurses. Approved by the House.

The Special Committee, appointed at the last annual session, to consider the suggestion of ex-President Hubert Work, urging the division of our membership into districts, reported adversely. Recommendation of Committee approved by the House.

The following resolution introduced by Dr. T. C. Chalmers, amended by the Reference Committee on Rules and Orders, was approved by the House:

Whereas, the honor and integrity of the Medical Profession is being reflected on by unnecessary, unprofessional, and unlawful prescribing of alcoholic liquors, by some unscrupulous physicians,

Resolved, That in the judgment of the House of Delegates, of the American Medical Association, all State and County Medical Associations should use their best endeavor to discipline physicians who either negligently or wilfully prescribe alcoholic liquors, otherwise than in accordance with the law, and to purge the profession of physicians who, wilfully, under the cloak of their profession, prescribe alcoholic liquors for other than medicinal purposes: and

Resolved, That the secretary forward a copy of this resolution to every State and County Medical Association affiliated with the A. M. A.

Dr. F. H. Martin was extended the privileges of the floor to explain the reorganization of the Gorgas Memorial Committee, and methods proposed to obtain subscriptions. Briefly, it is proposed to raise the sum of five million dollars, which is to be invested in trust securities, the interest to be used to construct and maintain the Gorgas Memorial Institute of Tropical and Preventive Medicine, to be located in the city of [illegible]. The House, by a rising vote, pledged the A. M. [illegible] to do everything in its power to assist the Committee.

The election of officers resulted in the selection of Dr. William Allen Pusy as President, Dr. Olin West, Chicago, as Secretary, and Dr. Frederick Warnshuis, Michigan, as Speaker.

Chicago was chosen as the meeting place for the 1924 Annual Session.

JOHN W. BELL.

THE PRESIDENT: The Association is greatly indebted to Dr. Bell for this detailed and very carefully prepared report. Will you take action on the report? (Upon motion duly made, seconded and carried, the report was adopted.)

THE PRESIDENT: I will now call for the report of the Member of National Executive Council, Dr. H. P. Ritchie, St. Paul.

DR. H. P. RITCHIE: I do not quite understand why that is called the National Executive Council. It is possible I have been attending for the last four years the wrong organization or the wrong meeting. In talking with Dr. McDavitt, he says there is no such organization. What I attended was the Annual Congress on Medical Education, etc.

The Annual Congress on Medical Education, Medical Licensure, Public Health and Hospitals, met March 5th, 6th and 7th, 1923, at the Congress Hotel in Chicago and fully reported in journals of the A. M. A. immediately following those dates. This is my fourth report. My first report was a long one full of enthusiastic comments upon the wonderful personnel of the speakers including the highest type of man interested in the form and methods of teaching, representing the ideals of our profession, lending their best efforts of thought and action to the elevation of standards and selection of means for their accomplishment.

During these four years there has been no let-down in the level of excellence. These meetings are open to anyone of the profession and attendance must result in profit, if only to bring intimately to your attention the best problems involved, not only of teaching, but of diplomacy and policy.

In the department of Education it is significant that most of the papers were from Committees of Investigation, on Graduate Medical Schools, Medical Curriculum, Nursing Education, etc.

This can be interpreted as meaning that the sterling work of this committee undertaken years ago under the chairmanship of Dr. Bevan has resulted in practical standardization of school and the course is now a follow-up and check and review, rather than the presentations of new policies.

A new feature in this work has developed, however, in the physical and equipment side of teaching.

The Present Ideals of the Physical Plant in Medical Education was given by Dr. Chas. R. Bardeen of Wisconsin Medical School and Dr. G. Canby Robinson of Vanderbilt at Nashville. They discussed arrangement of buildings, association of departments, relation of the elementary subjects and clinical teachings.

They reviewed these problems as shown by a number of schools and concluded that there were only two schools on the right track, Pennsylvania and Minnesota. And it may have been my pride and personal interest, in reviewing the photographs of their demonstration, that the report on Minnesota, if not the best at this time, showed the best prospect of the future.

One more thing only will be mentioned is a morning session on the subject, "Organization of the Public for Co-operation With the Medical Profession." Dr. Vaughan gave the Plans and Prospects of Hygeia. President Owen, of the National Education Association, made a most stirring talk upon the relations of the medical profession and the schools, involving our interests and advice in the direction of proper instruction and control in these fields.

He mentioned also the vast numbers of women's clubs anxious for our interest, willing to respond in effort and support to any program we may sponsor, and all we have to do is take the invitation.

These proposals and evidence should be taken and considered most carefully not only in our state but also county societies, as they indicate that public health or just health instruction and interest in public affairs, either personally or in groups or in formal organizations is becoming imperative if the profession is to combat the propaganda of spurious treatments and cures which now are, if not really, at least are apparently, in the ascendancy.

HARRY P. RITCHIE.

THE PRESIDENT: Will you act on the report of this committee?

DR. H. M. WORKMAN: I move its acceptance and that it be placed on file. (Motion was duly seconded and carried.)

THE PRESIDENT: Committee on Public Policy and Legislation, by Dr. F. J. Savage.

REPORT BY COMMITTEE ON PUBLIC POLICY AND LEGISLATION

October, 1923

One year ago your committee was voted an allowance of $500.00. During the session of the legislature the council allowed us an additional $200.00. We spent $481.51, so that the additional $200.00 was not used. This money was spent for stenographers, stationery, stamps, mimeographing and telegrams. Some legal advice was obtained from the Association Attorneys without charge.

The Basic Medical Practice Act aroused such a storm

of protest from optometrists all over the state that it seemed wise to modify the bill to make the examination for optometrists to cover the anatomy, physiology and pathology of the eye only, and to drop the subject of chemistry. This was done two days before the public hearing in the House and converted the optometrists from enemies into allies. They are evidently trying to raise their standards and see the need of broader education and this trend should be encouraged.

We could not learn from the State Dental Society what their wishes were but the dentists remained passive under the promise that if the bill were recommended by the House committee it would be modified as they desired, before being acted upon by the Senate committee.

There is still an unreasonable gulf between the professions of Medicine and Dentistry. Some plan of closer cooperation between our respective state societies should be worked out, so that vital matters, such as legislation, could be agreed upon well in advance.

The county medical and dental societies could well hold occasional meetings together, and even the state societies, if they met at or about the same time, could well exchange material of mutual benefit. For it must be said that dentistry, in any of its branches, except the purely mechanical, is quite as much related to general medicine as are some of our own specialties.

There is a good deal of feeling on the part of the dental profession against the medical profession on account of the existing gulf. A large portion of the dental profession with whom we had the opportunity to come in contact feels that the dental profession should stand by itself independently of medicine and is in opposition to a move which they believe to be in existence to make dentistry a branch of medicine and too largely under the control of medical men. They are more or less fearful that our proposed new law would add another year to the course in dentistry.

When we offered to exempt them from the provisions of our Basic Medical Practice Act they were insulted because that inferred they were not practicing the art of healing. When we agreed that they should come in under its provisions they could not see why their examination should cover the anatomy, physiology and pathology of the entire human body. We therefore modified the bill to make their examination cover the anatomy, physiology and pathology of the face, head and neck.

An additional cause of resentment on their part was that they were not consulted when the original bill was drafted.

The osteopaths did not oppose the bill. It was defeated by chiropractic opposition and killed in the House committee by a vote of 12-2. An attempt was made to revive it in the house and this mustered but 27 votes for it.

The osteopathic bill was passed by a small majority in the Senate after an apparent defeat, and by a 2-1 vote in the House. The two paragraphs which follow give the gist of the new features of the law.

"Osteopathic physicians, when duly licensed, shall have the same rights and power and shall be subject to the same duties as other physicians with reference to matters pertaining to the public health; including the reporting of births and deaths. Osteopathic physicians, when duly licensed, shall have the right to practice osteopathy, as taught in reputable schools of osteopathy, including the use and administration in connection with the practice of obstetrics, minor surgery and toxicology only of anesthetics, narcotics, antidotes and antiseptics, subject, however to the same state and federal restrictions and limitations as are by law applicable to physicians and surgeons licensed to practice medicine and surgery."

"Except as hereinafter expressly authorized as to the administration of anesthetics, narcotics, antidotes and the use of antiseptics, the license shall not authorize the holder to give or prescribe drugs for internal use or perform major surgery."

There were two chiropractice bills introduced. The first making the necessary course of study in Minnesota 4,100 30-minute hours, equivalent to 2,460 50-minute hours and possible of completion in 10 months. The second making the course of study 4 years of 9 months each. Both bills were recommended to pass by the House Committee on Public Health.

Your committee supported a bill introduced by the masseurs, providing for a nine months course of instruction prior to taking an examination before a board. This bill was introduced too late in the session for passage.

The original nurses' bill was so torn to pieces as to be scarcely recognizable. The clause in the original bill making the trained nurse of the future complete a high school course as a prelimnary to the study of nursing, caused bitter opposition from the medical men of the state representing the small country hospitals. These small hospitals found in this higher qualification, not only immediate difficulties in securing nursing materials, but greatly increased expense in maintaining a teaching force drawn largely from the registered nurses, graduates of the larger hospitals.

By the law finally enacted, their preliminary education must qualify them for high school entrance. Mention of the so-called practical nurse is entirely left out in the law.

Your committee endorsed the original bill and they wish to acknowledge an error of judgment in so doing, without first getting a larger expression of opinion from physicians throughout the state.

Your committee feels very keenly the fact that the medical man's opinion on medical matters as regards public health, as reflected by the legislative mind, counts for but little. This condition is deplorable and may be changed by years of effort. Among the factors in this viewpoint of the public may be mentioned the following:

We are at the present day getting the hostility which is so often directed by certain elements in society against orthodoxy. Many people clash with it whenever they observe it or witness its supposed strength.

Our professional cohesion is reflected chiefly in keeping our membership straight ethically, making it harder and harder for our own members to qualify (higher educational standards and longer course of study), and in a restriction of our own work whenever and wherever we may possibly bring it about by improved sanitation and public health.

We should strive for an enlightened educated public opinion to cover the entire country, emanating from the headquarters of the A. M. A. by means of the public press, the radio and the movies. Those who most need education to make them think right along medical lines are not going to subscribe to *Hygeia* and the *Northwestern Health Journal*. These publications are excellent, but their field is too small and these other agencies will reach thousands rather than tens.

It is quite evident that our medical men lack a general interest in civic affairs. If our demands for a broad type of preliminary education before going into medicine have any meaning as well as value, it should be reflected by a more consistent and intelligent civic outlook than we usually see.

This same feature is evident in the type of interest our membership is apt to show in politics: we find too many of our members willing to dabble in a small, pusillanimous type of local or ward "healing," but in no sense to take a substantial interest in the broader purpose of government, and we are conspicuously absent, for most part, from our public assemblies. There is a decided tendency to allow the control of many public health enterprises to drift into the hands of laymen. We must remember that one of our greatest means of demonstrating to the public the need of our long and expensive professional training, lies in the return we expect to make to the body politic by our intelligent direction of matters concerning individual and public health.

We are held up to personal ridicule by the peculiarities and shortcomings of our own membership in many ways, but conspicuously we should emphasize the following:

(a) Blatant and habitual abortionists, possessing medical degrees, disgrace us before the whole world: in every

community where these exist they should be forthwith put behind the bars.

(b) Some of our members charge fees far out of proportion to that which people can or should pay, and the whole profession suffers thereby.

(c) Expert testimony as now presented in our courts is a severe public test of our integrity, and reflects disastrously. Only by a mechanism which will remove the temptation to modify testimony for gain, and make the expert an officer or employe of the court instead of the litigants, will it be possible in the opinion of your committee to do away with the many and serious evils of present-day medical testimony.

(d) The booze-peddling doctor who sells his quota of prescriptions either to tipplers or bootleggers.

(e) The passing of the family physician, leading to the treatment of cases rather than patients.

(f) The rise of the cults. The osteopaths and chiropractors in Minnesota today number 500 to about 2,200 medical men.

Your committee recommends that the Secretary of the Society express by letter our appreciation of the consistent backing of the medical profession and our thanks for their efforts to the following men:

Senator Sherman W. Childs of Minneapolis.
Senator J. D. Denegre of St. Paul.
Representative Albin S. Pearson of St. Paul.
Representative John E. Stevens of Minneapolis.
Representative A. B. Cole of Fergus Falls.
Representative S. B. Shonyo of Elgin.
Mr. Pierson and Dr. A. J. Chesley of the State Board of Health.

We recommend that the component county societies permanently retain committees on legislation.

F. J. SAVAGE
E. L. TUOHY
S. MARX WHITE

THE PRESIDENT: You have heard the report of the Legislative Committee; what action do you wish to take on it? (On motion the report was accepted.)

THE PRESIDENT: The report of the Committee on Social Insurance by Dr. W. A. Coventry.

DR. W. A. COVENTRY: The Committee on Social Insurance has nothing to report. Nothing came before the committee and there was nothing that demanded any action.

THE PRESIDENT: We will now have the report of the Committee on the Gorgas Memorial Fund, Dr. Thos. H. McDavitt of St. Paul.

DR. THOS. H. MCDAVITT: The Gorgas Memorial, as you know, was started first by the American Medical Association to form some sort of memorial for Dr. Gorgas. It soon became evident to the Board of Trustees of the American Medical Association that it was absolutely essential that some other method of management be adopted rather than to send it around through the state associations and getting up subscriptions that would come in in the way that subscriptions usually do come in. In other words, that Dr. Gorgas was a larger man than just being a doctor. He was an international man and all of the organizations, medical and civic, almost in the entire world, were desirous of taking some sort of action in reference to a memorial for Dr. Gorgas. It soon became evident that a mere memorial such as is carried out ordinarily in the way of a monument or something of that kind was not a sufficient acknowledgment of such a large man.

While some of the state organizations have sent in subscriptions, the Board of Trustees, knowing that this was going to assume a larger place in national and international affairs than that of our own organization, returned all of these subscriptions. They called in experts to find out what would be the best manner and method of getting a memorial that would be sufficient to the cause. They called in Dr. Franklin H. Martin and several other specialists, and Dr. Martin, having made such a grand success with the College of Surgeons, took this matter under special charge. A corporation was formed under the laws of the state of Delaware, and I will read you a part of the report, which is sufficient as a report of our Gorgas Memorial Committee.

1. The Gorgas Memorial was organized under the laws of the state of Delaware with Admiral Braisted, Hon. John Bassett Moore, Surgeon General Ireland, Surgeon General Stitt, Surgeon General Cumming, Dr. Leo S. Rowe, Hon. Jose E. Lefevre of the Panaman Legation, President Belisario Porras of Panama, and Dr. Franklin Martin as the sponsors.

2. The object of the organization is to raise money, the interest of which will sustain a working memorial to General Gorgas, whose genius stamped out yellow fever and malaria in Cuba and Panama, and who taught us how to control those diseases.

3. The memorial is to be known as the Gorgas Memorial Institute of Tropical and Preventive Medicine, and will take the form of a research laboratory and a teaching institute in Panama for those branches of medicine.

4. The headquarters of this institute will be presided over by a board of scientific directors, of which Prof. Richard P. Strong, of Harvard University, has been selected as the first director. The institute will be located in Panama on a beautiful site on the shore of the Pacific, which was formerly in the exposition grounds of the city of Panama, and the site was donated by the Republic of Panama, and President Porras, backed by the citizens of Panama, has guaranteed the initial buildings.

5. It is the plan of the directors of the institute to raise the sum of five million dollars, which will be invested in trust securities, and only the interest of which is to be used to carry on the purposes of the organization.

6. The board of directors is composed of the following named men:

Honorary President, Warren G. Harding, President of the United States.

Dr. Belisario Porras, President, Republic of Panama.

Surgeon General Merritte W. Ireland, United States Army, Washington.

Surgeon General Hugh S. Cumming, United States Public Health Association.

Dr. Seale Harris, President, Southern Medical Association.

Mr. Bernard Baruch, New York.

Mr. W. P. C. Harding, President, Federal Reserve Bank, Boston.

Mr. Fred W. Upham, President, Consumers Company, Chicago.

Dr. W. H. G. Logan, Professor of Oral Surgery, Chicago College of Dental Surgery.

Dr. Gilbert Eitz-Patrick, Chairman Board of Control, American Institute of Homeopathy, Chicago.

Dr. Leo S. Rowe, Director-General, Pan-American Union, Washington.

Surgeon General Edgar R. Stitt, United States Navy, Washington.

Brig. Gen. Robert E. Noble, Surgeon General, Library, Washington.

Hon. R. J. Alfard, Panaman Minister, Washington, D. C.

Judge John Bassett Moore, Court of International Justice, The Hague.

Mr. Samuel Gompers, President, American Federation of Labor.

Brig. Gen. Charles G. Dawes, President, Central Trust Company of Illinois.

Mr. Adolph Ochs, Editor, New York Times, New York.

Dr. Frank Billings, Chicago.

Vice President and Chairman of Board of Directors, Dr. Franklin Martin, Director-General, American College of Surgeons.

Attorney, Mr. Silas Strawn, Chicago.

The chairman of the board of directors has been asked to assume the responsibility of conducting the campaign for raising the money, which carries with it the establishment of headquarters in Chicago, where the Chicago members of directors will act as an executive committee.

7. (a) The campaign will be carried on under the direction of a committee of one hundred physicians and civilians in each state of the United States, each province of Canada, and each of the Latin American republics, with the governor of each state or province and the president of each Latin American Republic to be asked to become honorary chairman of the respective committee.

(b) Each state and province will establish a committee of ten in each county, and in each city of over a hundred thousand inhabitants; and subcommittees of five in each ward of the larger cities.

(c) These committees will be called "contributing committees," etc.—

This will give your body an idea of what the Gorgas Memorial is intended to do, that it has enlarged its scope so much that it has been taken out of the hands entirely of our own organization and has been put into the hands of an international board. I have no doubt but that it will be a great success and we only wish the thorough co-operation of our own Minnesota State Medical Association.

THE PRESIDENT: Do you wish to take action on this report of the Committee on the Gorgas Memorial?

DR. J. A. CAMERON: I move that the report be adopted. (The motion was seconded and carried.)

THE PRESIDENT: The report of the Committee on Cancer, by Dr. Verne C. Hunt.

REPORT OF THE STATE CANCER COMMITTEE

To the President and House of Delegates of the Minnesota State Medical Society:

Your Cancer Committee begs to submit the report of its activities during the past year.

Cancer research has continued throughout the world with resultant accumulation of knowledge regarding its incidence and the relative value of the efficacy of the several accepted remedial procedures, with some apparent standardization of their application. However, until such time as the specific etiology or factors in the etiology of cancer is determined, it is not reasonable to expect that the results of the accepted methods of treatment will be materially improved through further development or by the institution of new methods at the present average time of their application. Instead, it seems that the opportunity for achievement to greater success in the efforts to combat the disease rests in the continuation of the educational propaganda adopted by the profession. Material improvement in the end results of the accepted methods of treatment may be expected if through education of the public the average length of time between the onset of the disease and application of these methods is shortened.

In accordance with expression of the opinion of the undersigned members of your Cancer Committee embodied in the 1922 annual report, that it can best serve the interests of the Minnesota State Medical Society by co-operating with the American Society for the Control of Cancer in their educational campaigns, the Committee has confined its activities to this work.

In November of 1921 the American Society for the Control of Cancer inaugurated its first annual campaign with noticeably keen interest and co-operation of the members of the State Medical Society. Under the direction of the State Cancer Committee a similar campaign, more statewide than the previous year, was conducted in November, 1922. The campaign consisted of the following:

A large number of public meetings were held throughout the state, the largest one of which was at the auditorium in Minneapolis, where an attendance of two thousand was reported. Doctor Billings' Cancer Lecture was read before religious organizations, lodges, and various clubs. Literature, which had been sent out by the National Society, was distributed, and cancer news articles and editorials were printed by various newspapers. Slides were shown in many of the moving picture theatres. Two 2-reel films, "The Reward of Courage," supplied by the National Society, have been shown throughout the year under the direction and supervision of the State Public Health Association. Many other activities, with which you are probably familiar, were carried out.

The State Cancer Committee would like to take this opportunity to thank the members of the State Medical Society who contributed so freely in time and money during this campaign. It is particularly indebted to those who traveled throughout the state to present cancer lectures at public meetings, defraying their own expenses.

The members of the State Cancer Committee consider this educational work of greatest importance in combating cancer, and urge its continuation under the direction of the State Committee, in addition to such other work as the House of Delegates may see fit for them to undertake.

Respectfully submitted,

VERNE C. HUNT (Chairman)
A. C. STRACHAUER
AARON F. SCHMITT
HENRY WIREMAN COOK
HARRY P. RITCHIE
WILLIAM F. WILD
A. J. CHESLEY

DR. F. L. ADAIR: While I listened to the reading of this report it occurred to me that so far as county co-operation was concerned, there has been no co-operation between the Cancer Work Committee of Hennepin County and the Hennepin County Society. I am very glad to note from Dr. Hunt's report that there is such close co-operation between the State Medical Association and the American Society. There was quite a little friction last year between the county society and some other organizations or committees which were carrying on a campaign without any consultation or attempt to co-ordinate.

THE PRESIDENT: The report will be adopted as read.

DR. VERNE C. HUNT: In an effort to make clear what has been going on, I might say that last year was the second year that this campaign was conducted by the National

Association. It has been the aim of the Cancer Committee to obtain co-operation in this work of all the county medical societies throughout the state. I might say that probably not until this year (for the campaign which is to be conducted this fall) have we been successful in having a county chairman appointed in each county, with the exception of five counties in Minnesota. Last year there was some friction and difficulty in Hennepin County. However, I think that as a result of several meetings that we have already had that any misunderstanding or difficulty that has arisen in the past has been completely ironed out. I am sure that Dr. Strachauer, who has been appointed by the State Association to act as chairman in Hennepin County, will see that the co-operation of the Hennepin County Medical Society is obtained.

THE SECRETARY: Do you know how those appointments are made, Mr. Hunt?

DR. VERNE C. HUNT: The thing about it is that the idea seemed to be that the members of the State Cancer Committee assumed responsibility for the state campaign. There has been an effort throughout the state, not necessarily in Hennepin County, to have county chairmen appointed. It has not necessarily been taken up by each county medical society to appoint that chairman. However, if it is the wish of the respective county medical societies to be instrumental in or to have the appointment of that county chairman I am sure that the State Cancer Committee would be very glad to adopt such a procedure.

DR. G. D. HEAD: It would seem to me that some method ought to be provided by which a very close co-operation could be established between the organizations of all medical men in the county and the work of the State Cancer Committee. I think it would be unfortunate to leave the matter in the disorganized state in which it is now, especially in some counties. It probably would be better for this body to express some suggestion by which that matter could be ironed out.

DR. F. L. ADAIR: I would like to offer a resolution. I had understood that the matter was entirely out of the control of the State Medical Association and that it was under the control of this national organization and the State Cancer Committee, which was not really a part of the State Medical Association. I had proposed, in connection with Dr. Pearce's committee, when he made his report, to suggest that some effort he made by the State Society and the county societies to co-ordinate with the National and the State Cancer Committee in some way, so that this campaign could be conducted through the State Association and its component societies instead of by independent organizations. That is what I had in mind. If it would meet with approval, I would be glad to offer such a resolution.

THE PRESIDENT: It seems that the Cancer Committee would be very glad to co-operate with the State Association and I think a resolution would be in order.

DR. F. L. ADAIR: I move that it be the sense of the House of Delegates that all posible endeavor be made to co-ordinate the cancer work of the State Association with the national and state organizations for the study and prevention of cancer and that the campaign in the state, insofar as possible, be conducted through the State Medical Association and its component county societies. (The motion is seconded.)

THE PRESIDENT: Would it be wise to have the Resolutions Committee consider that as a proposed resolution?

DR. H. C. BAKER: In our part of the state our medical society complied with the recommendation of the state president merely as a suggestion, when the state chairman appointed a man in our county to act as the head of the Cancer Committee. The state chairman went to the local medical society and he was the one that pushed the thing through. The county society never dreamed there was any opposition between the State Medical Association and the Cancer Committee. We very gladly co-operated. I can say there was not a city in our district that did not have a cancer meeting and not a schoolhouse that did not have a cancer meeting. Meetings were only given up when we had very heavy rain or stormy weather, where the meeting would be hard to reach.

DR. VERNE C. HUNT: I am very happy about this discussion. As chairman of the Cancer Committee I am very glad it came up because we know that this is a new thing. This national work in cancer has been an entirely new thing, and it has taken some time to get the thing started. It was organized in 1913 and the contingency of the war and various other things had some effect on its progress. It was not until the fall of 1921 that the thing was really taken hold of and that results were first obtained. We attempted first of all to get the co-operation of the county medical societies. It was a thing that they were afraid to take hold of, but the work has since been going along in good shape.

As far as Dr. Baker is concerned, I think he ought to be congratulated in the way that they have taken hold in his district. Nothing would please the Cancer Committee more than to have each county society take hold and push it over, and if the Hennepin County Medical Society will take hold of it and push it over I am sure nothing will please the Cancer Committee more. The same is true of any other county society. I am sure that all of the members of the State Cancer Committee will appreciate the co-operation of the county medical societies, and if we can be of any assistance to them to take over the work as a local unit we will do so. We will appreciate every suggestion and I am very happy to hear further discussion in regard to the future activities of this committee.

THE SECRETARY: I wonder if there is not a little confusion as to Dr. Hunt's position. You have two positions in connection with this campaign against cancer; that is, you are chairman of the Cancer Committee of the State Medical Association and you are also chairman for this section of the country, are you not, for the National Committee?

DR. VERNE C. HUNT: Yes. The way the National Society is organized for the conduct of its national campaign, they have divided the country into districts. This district consists of Minnesota, Iowa, North and South Dakota and Montana. A few years ago I was appointed regional director of those five states. The thing that I am interested in is the conduct of the campaign by whatever methods are best. A state chairman has been appointed in each one of those states to work out the lines of campaign for the best interests of each locality and each state. It has been

the intention and the effort on the part of this chairman for each state medical association and each House of Delegates to have a resolution adopted by which they will sponsor the work of the American Society for the work on cancer.

THE PRESIDENT: There is a resolution before the House. All in favor of adopting the resolution of Dr. Adair say aye; contrary. It is carried.

We will now have the report of the Committee on Necrology, by Dr. J. H. Adair. The doctor is not here, but I understand the report will be filed.

REPORT OF COMMITTEE ON NECROLOGY OF THE MINNESOTA STATE MEDICAL SOCIETY

The ranks of our membership have been depleted during the past year by the usual number of deaths. Good men and true have gone to their reward leaving a priceless heritage of labors faithfully performed and duties never slighted.

It is no trite saying that the world is poorer for their loss, for the sum total of their benefits to humanity is not to be measured in professional achievement, but rather by all which concerns the personal relationship existing between the physician and his clientele, and for which even the coin of the realm is but poor recompense.

So amid the turmoil of the busy lives we lead we pause to say "Hail" and "Farewell" to those of our number who now we believe "know in full so many of the things we know in part" and whose lives deserve far more than this brief acknowledgment at our hands.

The following is a list of those we so honor:

NAME	FORMER ADDRESS	DECEASED
Dr. Herman E. Molzahn	Saint Paul	10/25/22
Dr. E. L. Maurer	Brownton	10/26/22
Dr. N. L. Linneman	Duluth	10/31/22
Dr. J. G. Phillips	Northfield	11/27/22
Dr. A. A. Campbell	Ogema	12/18/23
Dr. C. E. Dampier	Crookston	2/20/23
Dr. J. P. Sedgwick	Minneapolis	2/25/23
Dr. A. W. Daniels (Honorary)	Pomona, Calif.	2/27/23
Dr. R. J. Hill	Minneapolis	2/27/23
Dr. G. E. Parsons	Elk River	4/ 5/23
Dr. A. B. Ancker	St. Paul	5/15/23
Dr. J. L. Lynch	Winona	6/20/23
Dr. Geo. E. Benson	Minneapolis	7/31/23
Dr. E. W. Buckley	St. Paul	9/26/23

Committee on Rules and Order of Business by Dr. Bratrud. I do not think he is here.

The Committee on Hospitals and Medical Education by Dr. W. F. Braasch.

REPORT OF COMMITTEE ON MEDICAL EDUCATION AND HOSPITALS

MEDICAL EDUCATION

Medical Education is necessarily divided into graduate and under-graduate fields. In considering the subject and making recommendations for the future, your committee has both fields in mind.

Graduate Education: The importance of graduate medical education has been recognized in recent years, and may best be considered by discussing its various divisions, namely, (1) Graduate courses of instruction controlled by universities, entailing special study over a period of several years, leading to a degree; (2) Courses in clinical medicine offered to general practitioners at the University, and (3) Systematic courses of instruction given by recognized clinicians to physicians in various portions of the state.

Graduate education in special subjects and affording training to men who desire to specialize is adequately taken care of in Minnesota. In fact, the University of Minnesota, in affiliation with the Mayo Foundation, has acquired an international reputation for the opportunities offered in the field of graduate medicine. In a recent national survey of graduate work leading to a degree it was unanimously agreed that nothing short of two or three years devoted to intensive study of diseases involved in the various specialties would be of any practical value. As a rule, however, the general practitioner does not desire the type of instruction, nor would it be advisable to use the material now employed for university graduate instruction for other purposes.

The short courses in clinical medicine offered to general practitioners at the University during the summer have proven to be of considerable practical value. It is unfortunate that the physicians of the state have not availed themselves more generally of these opportunities. However, there is little doubt but that in recent years economic factors have restricted a larger enrollment. It would seem, furthermore, that these courses have not been adequately advertised among the medical profession and we would recommend a more widespread publicity.

Undoubtedly, considerable benefit to general practitioners has been derived from the so-called "Clinic Weeks" held annually in the larger medical centers. That it is appreciated is evidenced by the increasing registration during the past few years.

Although the value of set papers such as appear upon the program for this session is beyond question, nevertheless the question arises whether greater emphasis of the clinical opportunities should not be made, similar to the programs of the Tri-State Medical Society.

The habit of taking trips to recognized clinical centers in this state and elsewhere should be encouraged. In no other way can a broad knowledge of the progress in medicine be acquired.

This committee heartily endorses the movement successfully carried out in several states which brings the opportunities for graduate medical instruction to the various portions of the state, so permitting a minimum loss of time and expense to the general practitioner. The various systems already developed in the several states should be carefully studied and adapted to the needs and circumstances existing in Minnesota. Such a system of graduate instruction might well be controlled jointly by the State Medical Association and the University. Such a movement should be coincident with a comprehensive statewide campaign of systematic presentation of medical subjects to the laity, since the future of medicine depends not alone on continued public effort but also that the physician is worthy of public confidence.

Therefore, to be specific, this committee would recommend the following:

(1) That the present system employed in intensive medical instruction leading to a degree in the various specialties be endorsed.

(2) That the University of Minnesota offer several courses of instruction at different periods of the year and possibly in a more concentrated form. Such courses deserve greater publicity and support among the physicians of the state.

(3) That the clinical opportunities offered during the Clinic Weeks in the larger cities be encouraged and developed even farther.

(4) That a system of graduate medical instruction be given by competent instructors in various portions of the state, enabling the general practitioner to become familiar with recent medical progress.

Under-graduate Education: In regard to under-graduate medical instruction as carried on at the University Medical School, we wish to state first that we are in accord with the sentiments expressed in the report of your committee on medical education of last year. We are glad to note that many of the recommendations made in this report have been followed during the last year by the University authorities.

It has been claimed that it was impossible to adopt some

of the recommendations in the Medical School because of a lack of funds. It would seem desirable that the members of this Association lend their aid to secure adequate funds in order that this and other progressive measures may be made available to the University Medical School.

Furthermore, the university authorities have been unable to secure the funds necessary to the completion of the building program of the Medical School, so that crowding and inadequate facilities hamper instruction. In order that the Medical School may be developed to the highest degree of efficiency, there seems to be no other recourse than to obtain donations from private individuals and institutions. Attention should be called to such generous donations which have been made to the University of Minnesota during the past year. We refer to the gifts made by (1) Mr. W. H. Eustis for the Children's Hospital; (2) Mrs. F. C. Todd and friends for the Todd Memorial Hospital, and (3) by the Citizens Aid Association of Minneapolis for a Cancer Hospital. We would recommend that the movement which is now on foot to solicit funds from the great foundation for the medical school receive the cordial and unanimous endorsement of the State Medical Society. We would also recommend that a statewide campaign sponsored by the members of this society be organized in order to influence wealthy patients or friends to make bequests to the Medical School, for how could surplus wealth be better expended than to promote institutions devoted to the alleviation of human suffering? For after all, the University Medical School is your medical school and every member of the Association should be vitally interested in its welfare.

HOSPITALS

Recent surveys made by the American College of Surgeons and the American Medical Association have so thoroughly covered the subject of hospitals in this as well as other states that there is but little left for this committee to suggest. During the past year, however, several matters have arisen in relation to hospitals in the state which deserve particular attention.

In the first place, we wish to endorse the action taken by the Board of Control of Ramsey County in consulting the Ramsey County Medical Society when appointing a sucessor to the late lamented Doctor Ancker. It is evident that the public, through the Board of Control, has confidence in the Ramsey County Medical Society, knowing that they would be disinterested in the choice of the most capable man for so important an appointment. If a similar action were taken by other institutions, the efficiency of the management of our larger hospitals would be guaranteed.

RELATION OF PUBLIC HOSPITALS TO MEDICAL EDUCATION

In general, we endorse any movement which would permit closer co-operation between the municipal hospitals and the University Medical School. The co-operation of the governing body of the hospitals, the medical societies and the medical school will undoubtedly not alone prove to be a very valuable asset for medical education, but for the hospitals as well.

We endorse the movement on foot to place the Minneapolis General Hospital on the University Campus or on land adjacent to the Medical School. Its location near the Medical School would be of inestimable value to medical education and also to the hospital as an institution for the care of the sick.

Co-operation of the Medical School and its hospital and laboratory equipment with the large municipal hospitals should furnish both for student and practitioner a splendid opportunity to observe the practical application of Medical Science. A municipal hospital conducted along these lines should develop not only more intensive instruction for the student, but by means of clinics and conferences, should furnish an opportunity for at least the practitioners of the city to keep in closer touch with the experience of the hospital.

The value of education in connection with the hospital from the practical side alone is inestimable. The student interne plan as carried out in the municipal hospitals is of great value to the medical students who, almost without exception, are enthusiastic about it. The municipal hospital is of vital importance to medical education, and on the other hand medical education is of vital importance to the hospital. The proper affiliation of all these interests is bound to redound to the advantage of both teaching and practice.

THE MINNESOTA GENERAL HOSPITAL ACT

This act was amended by the last legislature, making County Commissioners instead of Probate Judges the designated officials to certify indigent patients to the University Hospital. The Medical School is making efforts to educate officials and people and to popularize the hospital under this act, which provides for the joint payment for such patients by the county and state, thus relieving the educational funds of the University. The members of this Association can do much for the Medical School by bringing deserving cases to the attention of the County Commissioners and by certifying to their suitability for hospital treatment under the act. The doctors would then also assist their respective counties to receive their share of the state aid in this matter. It may be added that the law provides for the payment of physicians who examine and certify to such patients.

It should be emphasized that the University ought not to be expected to support a large hospitalization project purely from educational funds and, indeed, that the institution, on account of the large demands upon its resources from the standpoint of instruction cannot do this, even if it so desired. We, therefore, endorse as a simpler and better law, that the whole cost of hospital care be charged directly to the state according to the plan adopted in some other states.

W. F. BRAASCH (Chairman)
ARCHA WILCOX
A. R. COLVIN

THE PRESIDENT: Any discussion on this report of the committee?

DR. G. B. HEAD: I would like to move the adoption of this report, which it seems to me is excellent, and that a copy of the same be forwarded, if the House approve of it, to the President of the State University, and transmit it to the Board of Regents.

DR. H. M. WORKMAN: I second the motion. (The motion is duly carried.)

THE PRESIDENT: Report on Public Health by Dr. E. L. Tuohy.

DR. E. L. TUOHY: I might add that this committee personnel consisted of Dr. Albert Chesley and Dr. Helmholz, Rochester, Dr. Albert Chesley being of the State Board of Health. While we have had no actual meetings, we have had much correspondence, and some of the work we have attempted to do merged somewhat with the same material dealt with by Dr. Savage.

REPORT OF THE COMMITTEE ON PUBLIC HEALTH THE MINNESOTA STATE MEDICAL SOCIETY

Your committee desires to submit the following report, with just such amount of detail as to indicate the kinds of interest and concern the members of this society should have toward a variety of public health measures:

(1) Public Health, from the administrative point of view, has arrived at a very high plane of efficiency in Minnesota. Much of the credit for this is due the members of this society. Nevertheless, it is evident that the members of the profession do not easily sustain their interest in public health measures.

To illustrate: Public agencies, sanatoria and tuberculosis dispensaries have taken over most of the supervision

and care of the tuberculous. This has occurred in spite of the protests of the agencies in this field. It is increasingly difficult to get general hospitals to make provision for tuberculous cases. Interns and nurses in training look askance at such patients; few physicians in private practice seem to care to master the details of modern safe home treatment. Yet, it is agreed that under no possible practical extension of our sanatoria will more than one-fourth or one-third of these patients be institutionalized at any one time. Few physicians even, developing tuberculosis themselves, are given the proper encouragement to enter our sanatoria and protect themselves in this most useful specialty for their life work. There are many opportunities in our own state for these unfortunate members of our profession.

(2) Public Health, from the laboratory side, has been administered sanely, economically and consistently in Minnesota for over two decades. These laboratory facilities could not have been developed solely to assist the physician in his daily grind of making a living. If that were the case, then the engineering school would have developed public laboratories for private assaying or such blacksmithing novelties as acetylene welding. It must be perfectly obvious that the constantly increasing volume of work done by our state laboratories has come about through the proper effort to unite the practising physician up with the state and local health boards, whose primary business it is to restrict and limit disease.

To illustrate a means for our closer co-operation: The Division of Venereal Diseases of the State Board of Health has been performing routinely the Kolmer modification of the Wassermann test. It seems to many that this test is more sensitive and at the same time quite as safe from misinterpretation as any previous technique. Let us at this time, therefore, co-operate with this division in giving them our heartiest aid in the interpretation of their reports, and in giving to them freely of our clinical data. Let us do this rather than attempt to mix them up or enter into senseless judgment on the varying reports of the laboratories on the same specimens of blood.

(3) Voluntary groups and relief agencies are carrying on a large amount of work which narrowly borders upon, or in fact encroaches on, the work of the practicing physician.

To fail to take keen interest in these endeavors is to fasten their conduct and direction on a crowd of social workers and others without our point of view, and certainly without our medical judgment.

To illustrate: Our medical societies should insist on medical membership on a great variety of boards and committees doing relief and social work. We should ask for this not by any right of priority, but because of our inherent ability to serve, direct and guide medical endeavor better than anybody else. Medical inspection in schools should not be directed by social workers. While much of the routine work can be done by properly trained laymen and women, nevertheless, well-balanced and proportioned health work in our schools is a field that parents cannot afford to see relinquished by physicians.

(4) The term "Doctor" is presently coming to mean less and less, and we begin to see why our English brethren within the profession have never been particularly happy with it.

To illustrate: A rather large proportion of the population is fitted with glasses by optometrists or those of lesser training. Some of these men even fit school children with glasses. Optometrists claim the right to use the term "Doctor" because they are licensed as "Doctors of Optometry." It is quite apparent, however, that the public does not differentiate them from medical oculists with a medical degree and many more years of training. They are virtually "short-course doctors." Neither do they practice in sparsely settled districts, nor do they exact any lower fees from the public than our brethren, full-fledged specialists in diseases of the eye.

This simply focuses our attention upon the fundamental need of working consistently for a public opinion that will ultimately agree upon uniform preliminary standards of medical education—a true "Basic Medical Practice Act."

(5) New legislation is not always needed to push forward our efforts. Some things seem to remain undone because of delayed or lacking initiative.

To illustrate: Goiter prevention is one of the most striking opportunities for our profession to demonstrate its essential altruism. Every county society should have presently an active committee, working upon the problem of the best and most satisfactory means of providing iodin in some form, at stated intervals, to children and prospective mothers. A number of cities within our state have already discussed the question of adding iodin to their public water supplies. From data presently available, this method seems entirely feasible. The State Board of Health stands ready to co-operate with, and advise, any local community desiring to inaugurate this measure. If iodin is not to be administered in drinking water those portions of the population, particularly susceptible to goiter, should be induced by other means to take the iodin in some other form.

(6) We should aim to profit in every degree possible by the experiences and instruction which happen to be the scant holdover of good coming out of the Great War.

To illustrate: We should take fuller cognizance of the splendid work that has been done along the lines of physical reconstruction and vocational training. This work is gaining headway very slowly, and certainly our more concentrated areas of population show very large groups of crippled and maimed individuals who are unable to take their full part in the affairs of life. As the result of chronic infection and industrial crippling, we have a constant flood of incapacitated individuals upon whom the ordinary vicissitudes of life are daily proving disastrous. It is the common complaint that members of our profession do not give enough heed to the details of the reconstruction and training that these men and women need. Unless our hospitals take more interest in various mechanical means of providing both treatment and rehabilitation, we cannot wonder if these people venture upon the uncharted seas of quackery on their own initiative.

(7) The physician's personal conduct and example.

To illustrate: We should stand stanchly against any and all legislation that aims to use us to enforce a moral issue. Under the guise of a supposed medical need, the medical profession has been made the only legal agency through which alcoholic spirits may be secured by the public. The result is presently disastrous to our profession, and helps to put us in public contempt. We are losing prestige daily on account of the percentage of men in our profession who cannot stand the strain upon their moral stamina, and they fall victims to solicitations of tipplers and bootleggers, who either buy their prescriptions outright or peddle them to tipplers. Immoral, intemperate, abortion producing, booze writing members of our county societies should have their names taken off the roster until such time as they demonstrate their fitness to have membership restored.

(8) The House of Delegates last year endorsed the recommendation of the Health Committee and the State Board of Medical Examiners, with the Board of Control, for a general survey of the question of midwifery in Minnesota. This survey has been completed by Dr. Ruth Boynton, who assisted Dr. E. C. Hartley, Director of the Division of Child Hygiene. This work will be reported upon before this society at this meeting.

(9) Regarding the provisions of the Sheppard-Towner Act, we must report that the organized medical profession, one hundred per cent strong, has come forward without delay, and assisted in the organization of the County Administrative Board. Some difficulty here and there has been encountered in organizing this board, but it has never been due to lack of interest on the part of the physicians and health officers throughout the state.

(10) The work of the Vital Statistics field agent is fortunately being done again through the appropriation for the Division of Child Hygiene. In about six months in

1922 the field agent examined the records in thirty places, and secured two hundred and three birth certificates and twenty-three death certificates not previously filed according to law. Between January 1st and October 1st, 1923, the records in twenty-five places have been examined, securing one hundred and twenty-three birth certificates and thirty-nine death certificates of like character. Some prosecutions have been carried through, and a number of physicians have been brought to the realization of their duty by proper pressure.

(11) A nearly successful attempt was made by the State Board of Health to have passed by the legislature a bill to reimburse those typhoid carriers who were unavoidably kept from their ordinary duties by the restrictions incident to the protection of the general health of others. This is a principle which if once established might have far-reaching influence. One hundred and five typhoid bacilli carriers have been traced. Quite conclusive evidence has been produced to show that they were responsible for five hundred and twenty-eight cases of typhoid fever, with thirty-six fatalities. Reasonable measures only have been resorted to to control these carriers; the Dairy and Food Code under Section 45 has enabled the board to refer to the Dairy and Food Department such disease carriers who are not amenable to the supervision possible under the methods of the Board of Health.

Respectfully submitted,
E. L. TUOHY (Chairman)
A. J. CHESLEY
H. F. HELMHOLZ

DR. W. A. COVENTRY: I would like to ask if the statistics of the Bureau of Vital Statistics by the committee are the revised statistics or the first report that came out. The first report came out and some doctors were notified that certain birth reports were wrong. They said that certain births were not recorded. There was a flood of doctors to the Health Department to find out what was the matter. It appears that the investigators had gone to the different hospitals and had taken names from the hospital records, and if there was no report in the St. Paul office then the doctor that attended that case was called on the carpet, so to speak, and asked for the reason why the birth report had not been made out. It was found that there were many errors in obtaining the statistics. For instance, the name of the patient may have been wrong in the hospital and the doctor had the right name and made the report. He might have reported Frank James and at the hospital it was James Frank. Another doctor found out that after he had made out the report it was mailed to the local department and a copy was sent to St. Paul and another copy to Washington and in the jumble it happened that the report did not get to the state office. So I think this gives a wrong impression, especially if these figures are based on a preliminary report.

DR. E. L. TUOHY: The figures have certainly been checked and I assume they are correct.

DR. C. L. SCOFIELD: I just want to say that these figures as rendered are correct. I have gone into a physician's office and have found anywhere from three, four or fifteen reports that he has pigeonholed in his desk, covering a period of two or three years. They have never been sent to the State Board of Health nor to his local registrar. It is a case of neglect on his part. There are plenty of cases of that kind that we have on record in the office.

THE PRESIDENT: If there is no further discussion of this report it will be adopted. Committee on Public Health Problems in Education by Dr. A. J. Chesley.

DR. N. O. PEARCE: Dr. Chesley wired me yesterday that he had made this report and hoped it would be here in time. So far it has not come. I have not received it.

REPORT OF COMMITTEE ON HEALTH PROBLEMS IN EDUCATION

Gentlemen:

The president of the Minnesota Education Association appointed Dr. O. M. Haugan, Fergus Falls, Mr. H. A. Johnson, Mayo Clinic, Rochester, and Miss Lue A. Olds, Superintendent of Schools, Granite Falls, to represent that Association on the Joint Committee on Health Problems in Education.

There has been no opportunity for the members of the Joint Committee to get together, but this can be done during the M. E. A. meeting October 21-Nov. 3.

The legislature of 1923 made progress by passing Chapter 323, which provides for:

Physical and health education and training in all public schools of all pupils of both sexes unless physically unfit,
Suitable modified courses for pupils physically or mentally unfit to take courses provided for normal pupils,
No physical or medical examination or treatment of pupils whose parents or guardians object to same,
Physical and health education and training for all persons in training to become teachers,
Commissioner of Education to supervise the work and to prepare and publish and distribute manuals of instruction, to appoint a state Director of Physical and Health Education.

Mr. E. W. Evarts has been appointed Director of the Department of Physical and Health Education. He has conferred with the State Board of Health, the Department of Preventive Medicine and Public Health of the University regarding his program. Before publishing this manual, it will be submitted to these two bodies and to the Advisory Commission for Tuberculosis, the State Board of Control, the State Medical Society and others whose co-operation Mr. Evarts seeks.

The Department of Preventive Medicine and Public Health of the Medical School now gives courses to all medical students and also to students in the academic and technical colleges. Its teaching staff includes paid University instructors and unpaid members of the staff of the State Board of Health, the health departments of the Twin Cities, and from other official and unofficial health organizations.

The Division of Child Hygiene of the State Board of Health has met with success in its educational work conducted through the Extension Division of the University as a regular correspondence course for mothers and expectant mothers, and through the schools where classes in "Mothercraft," care of the baby, etc., are formed among girls of upper grades and high school. All schools in St. Louis County have this course as part of the regular school work. Other counties are interested, and when the textbook prepared by the Division for teaching the subject (now in press) is available, many counties will take up the work.

Everywhere the members of this Association have taken great interest in the program of the Division of Child Hygiene, and the number of mothers referred by them is constantly increasing.

The Minnesota Public Health Association Journal, under the editorial board of this Association, has taken an active and important part in public education relating to health subjects.

The Federal Board of Education has issued recently "Health for School Children," a report of the Advisory Committee on Health Education of the National Health Council. Your committee respectfully recommends this pamphlet (which may be had at 10 cents a copy from the Government Printing Office, Washington, D. C.), as well

as those of the Joint Committee of the A. M. A. and the National Education Association:

"Minimum Health Requirements for Rural Schools,"
"Health Improvement in Rural Schools,"
"Health Essentials for Rural School Children,"
"Illustrated Health Charts,"
"Health Service in City Schools,"
"Daylight in the Schoolroom,"

to physicians interested in health problems in education.

The A. M. A. held no conference this year of State Committees on Health Problems in Education. But the programs of the National Education Association and the International Conference on Education were full of health subjects.

Commenting upon the situation, Dr. John M. Dodson, head of the new Bureau of Health and Public Instruction of the A. M. A., which has replaced the Council on Health and Public Instruction organized in 1911, when the National Education Association and the A. M. A. met simultaneously in California, writes:

"Twelve years ago the general attitude of teachers toward instruction in physiology, hygiene and health was one of indifference, if not of antagonism. Today the leaders in the educational world are all but unanimous in the conviction that training for health must be the first thought in the process of education and they are framing their program on this basis. This radical change of view on the part of educators has not been due wholly to the work of the Joint Committee, but the Committee has been an important factor in bringing it about."

The new Bureau of Health and Public Instruction of the A. M. A. will continue the relationship previously held by the Council with the National Education Association. Dr. Dodson considers the Joint Committees in the States of more importance in getting results than the National Joint Committee.

Your committee recommends that the House of Delegates consider enlarging the membership from three to five so as to include a representative of the Department of Preventive Medicine and Public Health of the University, and to request the Minnesota Education Association to do likewise and include the Director of the Department of Physical and Health Education. The future promises much advance in health education in Minnesota, and the State Medical Association should be the leader in the work.

Respectfully,

ELIZABETH WOODWORTH
N. O. PEARCE
A. J. CHESLEY, Chairman

THE PRESIDENT: Committee on Miscellaneous Business by Dr. H. F. McGuigan of Red Wing.

DR. H. F. MCGUIGAN: There is nothing to report.

THE PRESIDENT: Statewide Publicity Committee, Dr. N. O. Pearce.

REPORT OF COMMITTEE OF FIFTY OF THE MINNESOTA STATE MEDICAL SOCIETY

This committee was appointed with two purposes in view, first, to promote schemes for proper publicity for the medical profession; second, for the purpose of studying the activities of public health and social organizations and making recommendations to this body governing our relations to the work of such organizations.

Under the first item, we have to report that we have cooperated with the Minnesota Public Health Association in the publication of the *Northwestern Health Journal*. The journal, as most of you know, is issued monthly and is devoted exclusively to educating the public in matters pertaining to medicine, dentistry and nursing. It is edited by a layman, but the material is all obtained by consulting men in the profession, and then criticized and censored by Dr. Wild of the Minnesota Public Health Association or the Board of Editors. The subject matter has been carefully selected with a view to giving people information on every-day problems of healthful living. The articles are short and couched in simple language easily understood by the uneducated layman, and the importance of medical advice is constantly impressed on the reader. In the eight issues so far published, there have been 17 articles on disease and its prevention, 5 on tuberculosis, 14 on eye, ear, nose and throat, 20 on food and nutrition, 27 on personal hygiene, 7 on industrial hygiene, 8 on mental hygiene, 13 on the care of the child, 10 on public health, 5 on the history of medical progress, 34 book reviews, 11 on dental subjects and 8 articles submitted by the Parent and Teachers and Nursing Organizations. Every effort has been made to keep away from the sensational, to make the articles interesting and to write down to a level that would reach the mind that has depended on the old-fashioned almanac for its medical advice.

The response to the subscription campaign, for this little magazine, has been very gratifying, the *Journal* on September 15th having 6,497 paid subscribers, of whom 408 are physicians, 182 dentists, and the rest members of the laity. There will be no trouble in increasing this subscription list to 10,000 or 15,000 during the next year, if we are able to obtain sufficient advertising to cover the increased cost entailed in printing and distributing that number. The public is interested and appreciative of this little journal, and it will be a real force in the medical education of the laity. The committee wishes to extend thanks to the Minnesota Public Health Association in general, and especially to Dr. Scofield, President, and Dr. Wild, Executive Secretary, who have given generously of their time, and who have made the publication of this journal possible.

Plans for the future involve some arrangement through which articles in the journal may be given to the country press in such shape that it will be possible for these papers to use them, thus reaching many thousand more rural readers. We are also attempting to have large industrial concerns subscribe to the journal for the families of their employees. Several large concerns are favorably considering this idea at present.

Relative to the second phase of the work, your committee feels that the large and ever increasing amount of public health and social work carried on by organizations, both state and voluntary, presents a vital problem to the practicing physician. The work of these organizations is no longer the haphazard, unorganized, ineffectual, sporadic, poorly directed efforts of well meaning but untrained philanthropic individuals, but is now as a whole tremendously efficient, well financed and with a definite program. And these organizations number among their salaried personnel many of the keenest and best trained people of the community. They are probably a permanent part of our community life, and the scope of their work has, as yet, no definite limitations. Their work is founded on the sound principle of educating the people to ways of better health, longer life, and better living conditions. They have the sympathy and support of the public, and the relation of the practicing physician to this movement becomes more uncertain with each new step they take into what has been conceived as the field of medicine. Fortunately, the work of these organizations leads the public toward medicine and not away from it. Undoubtedly, the large majority of physicians are in hearty sympathy and are ready to co-operate with all properly supervised public health and social activities. On the other hand, there are still many practicing physicians who are passively antagonistic and entirely without sympathy or desire to co-operate with this type of work, which they feel is an unnecessary, unwarranted and fruitless encroachment upon their exclusive field of activity. Again among some there is an underlying feeling that those who are interested or connected with public health activities are doing so largely for the purpose of exploiting these organizations through motives purely selfish and looking to personal gain. If there is ground for this, it must be removed. Certainly, the practicing physicians, through their organizations, must now take a most active part in this public health movement which is gaining such force and

has become such a large factor in the determination of the future status of the practice of medicine. Your committee believes that, without doubt, public health organizations are today the greatest enemy of all cults and healers, outside the field of regular medicine, and the medical profession should be behind this movement without reservation, but, in order to make this possible, we must develop among ourselves definite plans for co-operating with and guiding this work so that it remains in its proper channels. There are several things to be accomplished: first, we must so conduct ourselves that there will be no unfairness between physicians themselves; second, we must train organizations to seek advice and co-operation from our state and county societies rather than from individual members; third, we should be prepared through the appointment of necessary committees to meet such demands in a prompt and efficient manner; fourth, these organizations must be taught that in order to have the full co-operation of our societies they must conduct their work so as to respect the rights of the practicing physician.

In an effort to determine the sentiment of the medical profession relative to our relationship to public health and publicity work, fourteen proposals were submitted to the members of the committee with the understanding that only those which received practically the unanimous vote of the members of the committee would be submitted to the House of Delegates. Of these proposals, there were only six which received such vote of those members of the committee reporting, and these proposals are embodied in the following resolutions.

In presenting these resolutions, the committee does not wish them to be construed as in any manner showing a lack of appreciation of the valuable work of health organizations, or a lack of sympathy and desire for co-operation on the part of the medical profession, but rather as a sound working basis for greater harmony and fullest accomplishment. In order that the resolutions may have real force, they have been constructed on the principle that, while we assume no right to dictate to any health or social organization, we have the right to adopt rules governing the conduct of our own members.

1. Resolved that no physician engaged, or associated with men engaged in private or consultation practice, shall become associated in any manner whatsoever with the establishment and maintenance of any new, free, permanent clinic or dispensary until such project receives the sanction and endorsement of a duly authorized committee of the county medical society in which such proposed clinic or dispensary is to be located.

2. Resolved that no physician engaged as specified above shall associate himself with or become a party to any health or social organization engaged in the establishment and maintenance of permanent free clinics or dispensaries unless such organization maintains a social service investigation department of sufficient scope and efficiency that it can exclude from such free service individuals who are able to pay. The efficiency of such a department shall be determined by a duly authorized committee of the county medical society in which county such clinic or dispensary is conducted.

3. Resolved that no physician engaged as above specified, shall be a party to, or in any way associated with any voluntary organization conducting clinics or dispensaries of any type whatsoever where any compensation is accepted from the patient for medical services rendered.

4. Resolved that no physician engaged as above specified, shall in any manner be associated with any voluntary health organization making unsolicited visits in the home in case of sickness, or where there is a newborn child, unless such organization shall first confer with the attending physician, if there be one in charge of the case.

5. Resolved that the responsibility for the carrying out of all of the provisions set forth, or for infringements thereon, shall lie directly with the physician involved. A plea of lack of knowledge shall not be considered a valid excuse, as it is incumbent among physicians, especially those engaged as clinicians or associated with public health or social organizations, to see that the work of their organizations do not unfairly infringe upon the rights of physicians in private practice.

6. Resolved that because of the very close association of the work of the practicing medical profession and the public health organizations, it is desirable that, whenever possible, the county medical society, in which county such organization is located, should have official representation on the governing board of such organization.

7. Resolved that each county society be requested to appoint a committee on public health and publicity matters; this committee to be prepared to carry out the provisions of the foregoing resolutions, and to co-operate in a prompt and efficient manner with the public health activities of the county, also to co-operate with the Statewide Publicity Committee in their plans.

8. Resolved that the secretary of this association be instructed to forward to each county society a copy of the above resolutions.

	Affirmative	Negative	Question	No Vote
Rule No. 1.....	29	2		
Rule No. 2.....	30	1		
Rule No. 3.....	28	1	1	1
Rule No. 4.....	22	5	3	
Rule No. 5.....	24	4	2	
Rule No. 6.....	28	1	1	1
Rule No. 7.....	25	3	2	1
Rule No. 8.....	25	5		1
Rule No. 9.....	20	8	1	1
Rule No. 10.....	25	5		1
Rule No. 11.....	21	4	4	1
Rule No. 12.....	19	5	5	2
Rule No. 13.....	29			2
Rule No. 14.....	30			1

N. O. PEARCE,
Chairman

THE PRESIDENT: Any discussion on the report of this committee and these resolutions? If not, they will be adopted as read. What is there under the head of Old Business?

THE SECRETARY: Mr. President, in the meeting a year ago an amendment to Article IX, Section 3, of the Constitution was proposed, which has appeared in the last two issues of MINNESOTA MEDICINE. I will read it. The section mentioned reads as follows:

"The officers of this Association shall be elected by the House of Delegates on the morning of the last day of the Annual Session, but no Delegate shall be eligible to any office named in the preceding section, except that of Councilor, and no person shall be elected to any such office who is not in attendance upon that Annual Session, and who has not been a member of the Association for the past two years."

It is proposed to change the section to read as follows:

"The officers of the Association shall be elected by the House of Delegates at a meeting to be held the second day of the Annual Session,—" that would be tomorrow instead of Friday, "but no delegate shall be eligible, etc.," the change simply being, instead of the last day of the session, to have the last meeting the second day of the session.

THE PRESIDENT: What action shall we take on this?

DR. J. C. LITZENBERG: I move its adoption. (Motion is seconded and carried.)

THE PRESIDENT: New Business.

THE SECRETARY: Mr. President, I received a communication from Dr. Adair,—do you wish me to bring this up, Dr. Adair? The Society of Obstetrics and Gynecology has

applied for a Section in the State Medical Association, and a list of thirty doctors has been sent in, who petition for this special section, corresponding to our sections now under surgery and medicine, to be known as the section on Obstetrics and Gynecology. I might say that, in order for this step to be taken, this matter has to lie over until the next meeting, which is the adjourned meeting of this present meeting to be held Friday morning.

THE PRESIDENT: Is there any discussion on this petition at the present time, or shall we postpone discussion to the next meeting?

DR. G. D. HEAD: I think a provision has been made whereby anything of this sort should be referred to a reference committee for consideration and report. This is an important matter and I move you that this matter be referred for consideration to the Committee on Rules and Order of Business.

DR. H. Z. GIFFIN: Could that be referred to the Council?

THE SECRETARY: This is a matter of changing the By-Laws of the Constitution and these can be changed by a majority vote of the House of Delegates after a matter has lain on the table one day. I might say that this matter was taken up at the meeting of the Council this morning. They decided to simply refer it to the House of Delegates with no recommendation, to be discussed by the House of Delegates and to take whatever action they saw fit.

DR. F. L. ADAIR: I might say, in explanation of this request, that some of us feel that it is quite important, in view of all the propaganda regarding general welfare that the medical profession give a little more attention to the subject of obstetrics. It would be well if there could be some section of this State Association whereby obstetric problems could be presented and threshed out, not particularly for the benefit of the practitioner but to raise the general level of the practice of obstetrics in the state, and to bring before the practitioner the importance of better obstetric practice and to present ways and means whereby it can be obtained. I think the justification for asking for a section is that, if sections are recognized at all, certainly, so far as obstetrics is concerned it is one of the major branches of the practice of medicine. If there is any justification for sections at all there should be three sections instead of two, one in medicine, and one in obstetrics. It is of vital importance, I think, not only to the medical profession but also to the public that more stress be placed on obstetrical questions. That is the reason that this matter is presented to you at this time.

THE PRESIDENT: I think this is a very important matter. I do not think there is any question but what we are all agreed that we should give as much attention to the subject of obstetrics as anything else. I think we all feel that way. It has been my experience, however, from the little experience I have had in medical societies, that if a medical society of this size were divided up into too many sections, there might be a loss in interest, and no one section be of any value. I myself feel that if we form a section in obstetrics that the orthopedists and the pediatrists and people of that kind, who have a specialty, might feel that they want a section. I know from our experience in the American Medical Association; at one time they had something over twenty sections. That has now been reduced to sixteen. They had a section in proctology and stomatology, each one felt their importance, and each wanted a section.

I agree with the ones who offer this petition that the practice of obstetrics, especially in the state of Minnesota, is of more importance to the general medical man than anybody else. It is my own opinion that we should handle obstetrics on the program as we do now and keep the two sections. I think we ought to think that over and discuss it, and if there is no objection I will name a reference committee of three or five men to work this over and report on it Friday, unless you would like to do something else.

DR. F. L. ADAIR: I move that such a committee be appointed but that they consider more than that. I think they should consider the advisability of holding sessions devoted to different specialties rather than one session; that we have one morning devoted to a certain subject and another session in the afternoon instead of having two sections held at the same time. Possibly these specialists, with the chairman and the secretary, could make a combined program committee and make a program for the whole society and also for the session.

DR. J. C. LITZENBERG: In presenting this plan it is not at all the idea to form another section of specialists. We have our own special societies with which we are perfectly satisfied and we have altogether too many meetings, anyway. It was the idea that this major branch of medicine, which is of great interest to the country practitioners, should be given more attention, and that the chairmen and secretaries of the section on medicine and the section on surgery have not in the past exhibited enough interest to provide enough obstetrical papers for the benefit of the general practitioners. It is just as much a part of general medicine as medicine and surgery. I do not think that the objection that all of the different specialists will come in and ask for a section is well taken. I think it is a matter for the general practitioner to consider and I second Dr. Adair's motion.

THE PRESIDENT: Is there any further discussion? Dr. Adair's motion was to have a committee appointed to discuss this.

DR. F. L. ADAIR: Yes, a committee of five. (The motion was duly carried.)

THE PRESIDENT: Is there any new business to come before the House?

DR. F. L. ADAIR: It seems to me that there is a lot of overlapping of the reports of committees; I do not know whether there is an overlapping of committee activities or not. In looking over the committees I do not know how many are standing committees provided for by the constitution and how many are special committees. It seems to me it would shorten the proceedings and add to the efficacy of conducting business if these committees could be combined into two, a committee dealing with Medical Education and Hospitals and another one dealing with Public Health and Welfare, including Publicity and that sort of thing. I think we have some overlapping here. I do not know how many are provided for by the constitution and how many are special.

THE SECRETARY: In the constitution, under Chapter 8, the standing committees are provided for, as follows: Com-

mittee on Scientific Work, consisting of two sections; Committee on Public Policy and Legislation, Committee on Necrology, a Committee on Arrangements, and such other committees as may be necessary, such as are elected by the House of Delegates. Last year at our meeting a provision was made for certain committees being made standing committees; for instance, the Committee on Hospitals and Medical Education, it was voted to make that a standing committee. I presume that meant a committee from year to year. Then there were special committees appointed, for instance, for the Gorgas Memorial Fund. I must admit that in the holding over of certain other committees I had to use my own discretion on whether to allow them to die a natural death or not.

I think myself that we have too many committees, but I tried to play safe. When there was any question in my mind I have simply held over the committee that was in existence before. I think it was Dr. Head who, two years ago, presented a report wherein he recommended the appointment of reference committees. Whether that was to supplant all the other committees, or to supplement them, or simply provide a means, for instance in regard to this change in sections, for appointing a committee to act on some special proposition and report at the next meeting, I could not be sure.

I think it would be a very good scheme if we could decide definitely just what committees ought to be standing committees and what committees could be eliminated. Someone might make a motion that certain committees be discontinued. That would make it clear and it would make it easy for me to know what to do in regard to making out a list for the next meeting.

DR. J. C. LITZENBERG: In these reports it appeared to me that many of them are worthy of more careful consideration than just listening to them being read. I wonder if it would be practicable to have all reports of committees in the hands of the chairman or have them sent direct to all of the delegates sufficient time before the meeting so they could see and digest them and have the reports only in synopsis. There are subjects in which I am deeply interested and I cannot get their full import in hearing the reports read. I would rather spend my time in reading the reports over carefully before I come here. Sometimes there are important resolutions to be offered which we should know about beforehand.

I want to make a motion, but will not do it unless it meets with the approval of the House of Delegates. It seems to me that if we had the reports in our hands and read them over beforehand, then we could come here and act on them intelligently. At the meeting the reports could be offered in synopsis and it would not take so long a time to present them.

DR. W. F. BRAASCH: I would like to endorse that sentiment. It occurred to me as I read my report. I would like to have some definite action upon some of the suggestions I made and I think the same thing should be done with some of the other reports. I certainly endorse that very heartily. I would like a motion made to the effect that the committees be expected to have the reports in the hands of the Secretary, who shall have printed copies made and sent to all the delegates at least a week before the meeting, so they can act upon them.

THE SECRETARY: Before any action is taken on that, let me call attention to the fact that most of the printed reports of these meetings consist of the reports of the different committees and take about thirty pages in small eight-point type in MINNESOTA MEDICINE. It would mean that of every committee report as it comes in, and some would come in the last minute, there would have to be fifty copies made and sent out. It would mean a lot of expense. Of course, if it is worth while, all right.

I think you get further by committee action than in any other way. I think when you have committees that have considered these different propositions and considered them for a year and worked up their reports, if there is anything the House of Delegates does not like they are perfectly free to express themselves on the floor. This would mean the piling up of a lot of work. I cannot imagine myself doing it; I shall engage someone else to do it and charge it up to the Association.

DR. J. C. LITZENBERG: If it is worth doing it is worth paying for, if the suggestion is any good, and I believe it is.

I move that the Chairman appoint a Committee on Committees to consider which of those committees shall be permanent and standing committees and then to consider the suggestion and see whether it is worthy of adoption and report at the next meeting.

DR. A. C. BAKER: In regard to these committees I would like to say a few words. I would like to congratulate the Association upon the good work of the committees and although some of them have overlapped there has been no friction. We have had some wonderful committee work. The committees all have functionated and have made some wonderful reports.

DR. G. D. HEAD: I would like to endorse the remarks of the last speaker. At the end of this session I was going to congratulate you upon the fact that the chairmen of your committees have all rendered such fine reports before the House of Delegates today. I think it is a matter of congratulation, gentlemen. We ought to congratulate ourselves that we have had such a fine line of reports presented, and I cannot sympathize with the men who are complaining about lack of time in listening to the fine reports that have been made. These are important matters. We must listen to the ideas that are presented here and the fault lies with us; we are not doing anything. These men are rendering us reports and making suggestions and instead of having a lively session here with a discussion upon each of those reports we are simply in a perfunctory way adopting them and putting them on file and not discussing them or having an interchange of ideas.

The plan I presented a couple of years ago was that when a committee report was presented here, or when any resolution was presented, that, instead of acting upon it at the time it was presented, we have a system of reference committees; that our reference committees, most of them, be our standing committees; that whenever a resolution is presented, instead of acting upon it at the time it is presented, that the matter be referred to some reference committee, either arbitrarily by yourself or by vote of the House, and then the reference committee consider it and

present their report at the second session of the House of Delegates when there is an opportunity for all of us to hear the report.

Take Dr. Braasch's report on medical education. There are some very valuable suggestions in there that ought to receive consideration and there ought to be lively discussion and definite action and recommendation. Now, if that report be referred to a standing committee, which is a reference committee here in the House, and then this committee report on those recommendations at our second session; that will give us a chance to take action on each recommendation. As it is now I think the trouble is that we are too perfunctory in simply listening to the reading of the reports, putting them on file and doing nothing more. If a Committee on Committees is to be appointed I would suggest that they take up this matter as suggested of having reference committees to which all of these matters can be referred the first day of the session after the report has been read; and then the recommendations acted upon after the committee has given them due consideration and makes to the House some kind of recommendation.

That is the plan adopted by the House of Delegates of the American Medical Association, and those of us that have served in that House, and, I think Dr. Bell and others will agree with me, the plan is a most admirable one. It assures careful consideration of any subject of any importance that comes before the House of Delegates.

DR. J. C. LITZENBERG: I hope that my remarks will not be construed as a criticism of any committee, but I would have liked to have had a chance to read the reports before they were presented here. Perhaps Dr. Head's idea is better, but there ought to be some way by which we could get them before the House. If we could have had Dr. Braasch's recommendations before, so we could have digested them, we could have come here prepared for good, careful discussion and action. It is because the reports were so good that I would have liked to have read them over and not because they are so bad.

DR. G. D. HEAD: I might say that the reference committee system did not enlarge our roll of committees. It was adopted by the House of Delegates and these committees were made standing reference committees. I know that the Editing and Publishing Committee was made a standing committee and the committee on Hospitals and Medical Education and the committee on Public Health and the committee on Order and Public Business were all used as reference committees, so it did not add to our number of committees. It seems to me that the duplication arises between the Committee on Public Health and the Committee on Public Health and Education. Those two committees might be combined, otherwise I do not see any duplication.

DR. A. C. BAKER: It seems to me that we have this matter that Dr. Litzenberg has suggested in our hands. I feel that same way. I think the reports were very good but I cannot carry the points in my mind just from listening to them. This is entirely in our hands. I believe every delegate could act more intelligently and it is simply a question whether we want to do it or not.

DR. W. F. BRAASCH: I am in sympathy with the suggestions made by Dr. Litzenberg but, nevertheless, having had the other experience, I cannot agree with the sentiment expressed by Dr. Head. The reports are read toto and the American Medical Association surely listen very attentively and get what they can out of the reports and then they are referred to a reference committee and this committee goes over and takes out the resolutions that it feels are important and brings them up for discussion. I think there must be some reason why the House of Delegates does not publish the reports and that reason is in all probability the matter of expediency. In other words, committees do not sometimes report in time and the bulletin given out might only contain half of the reports. Whereas theoretically it would be an ideal thing, there are probably a lot of practical difficulties in the way. I think it would be well to adopt the method in use by the House of Delegates of the American Medical Association.

THE PRESIDENT: Was Dr. Litzenberg's motion seconded?

DR. J. C. LITZENBERG: I wanted to move to have a committee to consider the question of committees and if advisable to combine two or three into one and make them do that. Or they could adopt Dr. Head's suggestion that we take care of these suggestions and resolutions by reference committees, or they could adopt my suggestion that they send the reports out in advance, and then come back with recommendations on the suggestions made. That is the way I make the motion, that a Committee on Committees be appointed to consider the best manner of handling the reports so the House of Delegates can best act on them.

(The motion was duly seconded and carried.)

THE PRESIDENT: I will appoint on that committee Drs. Head, Litzenberg, Parker, Burnap and Tuohy. On the committee on section work I will appoint Drs. Adair, Hunt, Braasch, Baker, Ewing.

THE SECRETARY: There is one matter I was requested to bring up, by some representative of the Woman's Club. They requested that we take action on the following resolution:

"Whereas, the United States has held the leadership in the movement for the establishment of an international court for a generation, and in the firm belief of methods of arbitration in the settlement of their disputes,

Therefore, Be It Resolved, That we, the Delegates of the Minnesota Medical Association, in convention assembled, approve the entrance of the United States in the permanent court of international justice."

(Upon motion duly made, seconded and carried, the resolution was referred to the Reference Committee.)

THE PRESIDENT: Any other new business? If not, a motion to adjourn is in order.

(The meeting was then adjourned until ten o'clock A. M., Friday morning.)

FRIDAY, OCTOBER 12, 1923—SECOND MEETING OF THE HOUSE OF DELEGATES

The House of Delegates met pursuant to adjournment at 10:30 A. M., and was called to order by the President.

The Secretary called the roll and the following members were present:

Blue Earth County—Dr. H. J. Lloyd, Mankato
Camp Release Dist.—Dr. E. M. Clay, Renville
Clay-Becker—Dr. F. A. Thysell, Moorhead
Hennepin County—Dr. L. A. Nippert, Minneapolis

Hennepin County—Dr. W. A. Jones, Minneapolis
Houston-Fillmore—Dr. Cyrus B. Eby, Spring Valley
Mower County—Dr. R. S. Mitchell, Grand Meadow
Olmsted County—Dr. D. F. Hallenbeck, Rochester
Olmsted County—Dr. A. H. Logan, Rochester
Ramsey County—Dr. W. C. Carroll, St. Paul
Ramsey County—Dr. E. C. Eshelby, St. Paul
Ramsey County—Dr. Asa M. Johnson, St. Paul
Ramsey County—Dr. J. A. Cameron, St. Paul
Red River Valley—Dr. P. F. Melby, Thief River Falls
St. Louis County—Dr. C. L. Haney, Duluth
St. Louis County—Dr. O. W. Parker, Ely
S. W. Minnesota—Dr. F. W. Metcalf, Fulda
Stearns-Benton—Dr. W. L. Beebe, St. Cloud
Wabasha County—Dr. D. S. Fleischhauer, Wabasha
Washington County—Dr. J. W. Stuhr, Stillwater
Wright County—Dr. L. Harriman, Howard Lake

The next order of business being election of officers, nominations for President were called for.

Dr. F. R. Weiser nominated for President, Dr. Archibald MacLaren. Another member nominated Dr. F. A. Dodge of LeSueur.

As there were no further nominations the names of Dr. MacLaren and Dr. Dodge were balloted upon, Dr. MacLaren receiving 20 votes and Dr. Dodge 7.

It was moved that the election be declared unanimous for Dr. MacLaren. This motion was seconded and carried.

The following officers were nominated and declared duly elected:

First Vice President—Dr. E. T. Sanderson, Minneota
Second Vice President—Dr. F. J. Hirschboeck, Duluth
Third Vice President—Dr. C. W. Bray, Biwabik
Secretary—Dr. Carl B. Drake, St. Paul (re-elected)
Treasurer—Dr. F. L. Beckley, St. Paul (re-elected)
Councilor for the Sixth District—Dr. F. R. Weiser
Councilor for the Eighth District—Dr. W. F. Braasch

THE PRESIDENT: During the past year I took the liberty to appoint two councilors, one for the First and one for the Fourth District, to replace Dr. C. E. Dampier and Dr. R. J. Hill, both deceased. There is nothing in the Constitution to authorize the President to do that but it seemed to me that these Districts should be represented and after consulting the other councilors I appointed Dr. Condit and Dr. Burnap to fill these vacancies. Shall these two men continue in office until the natural term expires?

A MEMBER: I move that these appointments be confirmed and that these men continue in office until the term expires. (Seconded and carried.)

Dr. J. C. Litzenberg was then elected as Delegate to the American Medical Association.

Dr. O. W. Parker was then elected as Alternate Delegate to the American Medical Association.

THE PRESIDENT: We will now hear the report of the Reference Committee.

DR. J. C. LITZENBERG: The members of the Reference Committee met to consider the propositions that were discussed in the first meeting of the House of Delegates. There were two plans that received enthusiasm in that discussion. One was a plan which had been discussed before and which Dr. Head revived; the other was a plan which I suggested, to the effect that the reports be sent to the House of Delegates. It was the consensus of opinion that my suggestion would be rather cumbersome and, therefore, we beg leave to submit the following report:

First, we recommend that the chairmen of all committees submit a synopsis of their reports to the Secretary of the Association in sufficient time to be published in MINNESOTA MEDICINE, if the Secretary thinks they should be so published.

Secondly, all reports which contain recommendations for legislation by the House of Delegates shall be referred to a Reference Committee, which may be either a standing committee of the Association or a special committee, as the President may elect. All reports sent to the Reference Committee must be reported back to the House of Delegates at the second meeting of the session.

Third, your committee also recommends that the Committee on Public Health and the Committee on Public Health Problems in Education be combined into one committee, The Committee on Public Health.

Fourth, your committee also recommends the abolition of the Committee on Miscellaneous Business.

Respectfully submitted,
GEORGE D. HEAD
O. W. PARKER
J. A. CAMERON
ALBERT SHULTZ
J. C. LITZENBERG, Secretary

THE PRESIDENT: Are there any discussions of this report?

A MEMBER: The day before yesterday the House of Delegates received a communication which was referred to the Reference Committee. This communication was from a certain women's club and asked for an expression of our opinion on the question of world participation by this country. I have nothing to say about the merits of the case but a good deal has been said in the last two days about the fact that the medical profession does not take an interest in outside affairs and I believe it would be wise to take up the matter. The Reference Committee should look into it and report to this body for action.

THE SECRETARY: Someone moved that this question be referred to the Reference Committee but no specific Reference Committee was named. It seems to be, however, that this matter could be handled very well by this body today.

A MEMBER: Mr. President, I move that we accept the suggestion of the Secretary and act upon the resolution at this time.

Seconded and carried.

A MEMBER: Mr. President, I move that the Report of the Reference Committee be accepted and that their recommendations be carried out so we can get this before the House for discussion.

Seconded and carried.

THE SECRETARY: Unfortunately, the copy of that resolution was handed to the official stenographer and I haven't it here. It was read at the other meeting and was to the effect that this Society go on record as being in favor of the United States' participation in the World Court. Personally, I believe that this is not a medical question, but the medical profession is certainly interested in future wars and I want to put my word in favor of passing this resolution. It won't accomplish very much, but it will put us on record as favoring this proposition.

DR. W. A. JONES: Mr. President, I move that the Secretary be instructed to participate in this movement and that we go on record as joining with him. (Laughter.)

THE PRESIDENT: Is there any further discussion?

DR. F. L. ADAIR: Mr. Chairman, I think we are acting on something we know very little about. We do not know the ins and outs and I am very much opposed to acting on resolutions in a blanket sort of manner and endorsing things that are entirely out of our sphere. If we were a body of lawyers we might act intelligently on this matter, but we are interested primarily in medical matters and in public health. The medical profession would be in more popular esteem if it would restrict its action to things it knows something about.

THE PRESIDENT: I am very much in sympathy with the action, but I doubt very much if we should recommend it. Is there any further discussion?

A MEMBER: I move that this matter be laid on the table.

Seconded and carried.

THE PRESIDENT: The Secretary has just handed me the report of the Committee on Public Health Problems. It is a long report and the question is whether or not you want it read at this time.

A MEMBER: I believe that the report has not anything particular in it which needs to be acted on and I move that it be received and published with the proceedings of the meeting.

Seconded and caried.

THE SECRETARY: Mr. Chairman, I have a communication addressed to the Chairman of the Resolutions Committee from Dr. W. F. Bleifuss of Rochester, which is as follows:

"Dear Sir: As Chairman of the State Committee in charge of the health promotion campaign sponsored by the National Health Council, I have prepared the enclosed resolution for your consideration. If your committee sees fit, we should like to have it passed. The other members of the state committee are Dr. A. J. Chesley, Secretary State Board of Health; Dr. W. F. Wild, Secretary Minnesota Public Health Association; Dr. H. Diehl of the University, and the Secretary of the Minnesota State Medical Association, Dr. Drake. I will ask one of these to take this up with you tomorrow. I realize that very much cannot be expected from such a resolution, but it will help to get the matter before the doctors."

This is the resolution Dr. Bleifuss enclosed:

"WHEREAS, the need and value of periodic medical examinations of persons supposedly in good health are well known to physicians and are being increasingly appreciated by the public, and

"WHEREAS, the National Health Council, with the endorsement of the American Medical Association, has inaugurated a national campaign for the promotion of such examinations.

"BE IT RESOLVED, That the Minnesota State Medical Association endorse this campaign and call upon all County Medical Societies to take such steps as are most practicable to insure the extension of a thorough health examination service to the public, at a reasonable charge."

DR. W. A. JONES: Mr. President, how are we going to force people to be examined? We have a number of competitors engaged in the so-called "healing art" and they are not going to permit their patients to be examined. It is all well as far as it goes, but can we get to the people who ought to be examined? Perhaps we could by some legal process. I understand that this is a nation-wide campaign, but can we really get to the bottom of the situation simply by asking medical societies to see that all people are examined once a year? We have to present a very good reason why people should be examined and the only way we can do it is to publish it in the daily papers and put it in as a plain medical advertisement that it is the opinion of the American Medical Association and the State Medical Society that everyone ought to be subjected to a yearly examination. Maybe we could get something done that way. We have to spend money for advertising, of course, but it would do good work. Possibly it would also elevate our profession to a dignified position.

A MEMBER: I think this is an extraneous organization and it should be understood if we endorse their actions that the work they carry on should be done in co-operation and in conjunction with the state and local medical societies. There are too many outside agencies that seek the endorsement of medical societies and then they go ahead and operate independently without very much consideration of the medical organization. I believe when we endorse these things we ought to tie a string to them so that things that are done are done through the medical organizations and not by any groups of medical men.

A MEMBER: Mr. President, I endorse the statements of the last speaker. At the present time we are having clinics in our town, too,—baby clinics and chest clinics. These clinics are put on without consulting any local men whatever. Somebody comes along and puts on a clinic, perhaps the Red Cross or the visiting nurses. Now, I do not think it is possible for any man to come into town and examine from thirty-five to forty chest cases from 11 o'clock in the morning to three o'clock in the afternoon and pass on them in an intelligent manner. Still, that thing is being done. People are told they have or have not tuberculosis just by means of the doctor's stethoscope and his hands and ears and eyes.

I do not think this should be done and we should not be hasty in entering into these things unless we know they are going to be done properly. A great deal of feeling has been worked up through these things.

The same thing is done in the baby clinics. Forty or fifty babies are brought down and a man examines all of them in three hours. Nothing whatever is said to the local men. I went down to one of these clinics and found out just what was being done. The man would say, "Go down to the drug store and buy some cod liver oil and feed it to the baby, or go to your family doctor." There should be no "or" about it! It should be sent back. That baby needs careful watching and care and it should be referred back. The local man should have something to say about these clinics.

I do not believe it is possible for any man to examine thirty-five or forty babies in such a short time unless he is a superman. I know sometimes I have difficulty in examining two cases but I may be just an ordinary idiot. These things should be taken very slowly.

A MEMBER: Mr. President, I do not believe that the doctors who are making these arguments have listened closely to the reading of this resolution and the letter which

preceded it. This is not an attempt to compel people to have examinations, but it is a request to the physicians of the local societies to take an interest in this matter. It seems to me that from that viewpoint the resolution is eminently proper.

At the request of the President the Secretary re-read the resolution.

THE SECRETARY: It is my impression that the National Health Council is part of the A. M. A. Does anyone know for sure?

A MEMBER: No, it is not. It is an independent organization.

DR. W. A. COVENTRY: Mr. President, there is a question which is running through this House all the time. Resolutions are brought up and read and passed and I venture to say that seventy-five per cent of the doctors do not know what they contain.

To my way of thinking, these resolutions should be received on the first day and referred to a committee to report on the second day of the session and in that way we will have some idea of what they are. I doubt very much if there are two per cent of us who know what this resolution is. We have no idea what the campaign is that is referred to.

DR. H. J. LLOYD: I feel as the last speaker does, that the resolution is rather vague. There is no definite plan. We do not know the plans of the proposed campaign and we do not know what is to be done. However, we do know that the work of the Health Association has been very good. I know in Mankato they put on a campaign which came through the members of the Society and the examinations were carried on by the physicians there as well as one sent by the Public Health Association. There was an *x*-ray available for them and very careful examinations were made. A good many people who could not afford to pay for examinations came and were found to be tuberculous. On the other hand, a great many people sneaked in and had examinations that should not have had them, which is often the case.

I think this is a movement we should go on record as supporting if it could be definitely shown what they are to do.

It was moved that this resolution be laid upon the table. Seconded and carried.

PRESIDENT: I think it would be advisable to have a committee appointed to look into the activities of some of the other states. It might help us to answer some of these questions.

I have been greatly interested in viewing the activity of other states in the formation of Health Leagues and things of that sort and I have noticed where these leagues have been formed they were very enthusiastic about the work they have done. Michigan, Colorado, California, Idaho, and any number of states have Health Leagues that are said to be very influential and I believe we should investigate them.

I know we have a Committee of 50 of which Dr. N. O. Pearce is Chairman and this Committee is doing very good work, but I think Dr. Pearce is doing all the work himself. Then, too, I do not believe he has quite the authority he should have to go ahead and organize something in the way of a Health League.

I should like to have a motion presented to give the new President authority to appoint a committee to investigate the actions of other state societies and see if it would not be well for us to organize something of the same kind ourselves.

It was moved that this be reported to the Committee on Public Health.

Seconded and carried.

DR. W. A. COVENTRY: Mr. President, I would question the advisability of this resolution because unquestionably it requires a large amount of work and because the subject is of such importance that it deserves special consideration. Although I am sure that the Public Health Committee would be thoroughly competent to do it, nevertheless the question arises as to whether or not it would be advisable to have a special committee for this purpose.

At the same time, I wonder if the committee could not embody the question of postgraduate instruction as other states do. Then we could send men out to various portions of the state to meet the general practitioners and give them postgraduate instruction at a minimum of expense, effort and loss of time.

A MEMBER: Mr. President, it seems to me that it is rather unwise to multiply committees any more than we possibly can help. If we give the committees that have already been established work to do and investigations to carry on we have a better working organization than we would have if committees were appointed to take up special subjects, as has been suggested. When special committees are appointed it oftentimes leaves our standing committees with nothing to do unless they take up something themselves.

DR. SCOFIELD: I have been very closely connected with this work in the state for a great many years and the discussion here today has convinced me that the medical men of the state have very little knowledge of the work that these voluntary associations are attempting to do. The demand for this service is coming directly from the people and the demand is on the medical profession and we are not responding. We say, "Let these voluntary organizations stay out and the doctors will look after this," but the doctors are not doing it and they have not done it. That is why social workers with the assistance of nurses are doing these things and through this committee, I believe, the association could be made acquainted with the activities of these voluntary organizations. Then we could either endorse them or not, as we saw fit.

THE PRESIDENT: That is exactly what these Health Leagues have been doing,—organizing and getting a representative from each health association and trying to combine everything in one Health League so that there will be a definite organization and scheme for working.

A MEMBER: I think it is a mistake to multiply committees. When we have a Public Health Committee that is logically the place for it. Perhaps three men will not be enough to do the work that is necessary, but I believe that a committee functions much better when it has a real job to do. I am not in favor of a special committee for it but I do think it might be wise to allow the chairman of the

committee to add to the number of men on the committee those who might be specially interested in the work. If I were chairman of that committee I know I would want Dr. Judd's experience. I think everything of a Public Health nature should be taken care of by the Public Health Committee.

THE PRESIDENT: It is perfectly agreeable to me to have this go to the regular committee in Public Health matters, but perhaps calling their attention to some of the activities might be a good plan. The idea is that some one committee should feel it their duty to investigate the activities of the state societies and let us know about it.

Dr. Adair moved that this matter be referred to the Committee on Public Health.

Seconded and carried.

It was moved that the report of Dr. W. F. Braasch's Committee dealing with postgraduate instruction be referred to the Committee on Medical Education, said Committee to render a special report at the next session.

Seconded and carried.

THE PRESIDENT: Is there any new business to come before the House?

DR. J. C. LITZENBERG: I believe we have made a mistake in having any sections at all. This Society is not large enough for sections and I believe we should have one section and that it should be educational for the profession of the state. I think this is a good time to discuss that particular matter. To my mind, we should have the surgical and medical papers in one section, as this is for the profession of the state and not for specialists in particular. As a matter of fact, when the specialists write papers it is for themselves. This may raise some hullabaloo, but I like that. (Laughter.)

THE SECRETARY: Let us look at this from another standpoint. I have been a member of the Program Committee for three years and you will notice that the program in both sections is very crowded. If you are going to have but one section it means you have to have two more days for the meeting or else have just one-half as many papers.

DR. J. C. LITZENBERG: That would be better.

THE SECRETARY: Possibly it would, but there are a great many doctors who want to present papers. It amounts to almost the same thing as one section because you can step from one room to another so easily. I think it would be a mistake to have but one section.

A MEMBER: I want to say something in regard to the papers. Some of them were 'way over the heads of most of the doctors and others were on subjects in which the average doctor is not interested. I will not specify papers, but some of them were even over the heads of the surgeons in the surgical section—good surgeons, too.

There are two kinds of waste of time in papers. One is the paper that is no good and the other is the paper that is so good no one understands it. If those papers were eliminated the enthusiasm in our society would be like that in the Tri-State Society. Why are they so much more enthusiastic than we are? Because the papers interest everyone who goes.

DR. R. S. MITCHELL: Mr. President, the Secretary said it would be necessary to prolong the meeting for a day or two if it were put into one section. It occurred to me if this was done it might be of benefit to some of us fellows on the outside. It is often hard for members living 150 or 200 miles away to attend the full session. If the program were so arranged that one day could be given to obstetrics, another to surgery and another given to general medicine, etc., then we fellows on the outside could attend on the day or days on which subjects we are interested in were discussed and in this way we would not lose any time.

This morning I listened to a paper that was of no interest or use to me whatever. If there was but one section we could utilize our time to the best advantage.

DR. GEO. D. HEAD: I am very much in sympathy with Dr. Litzenberg's remarks with relation to the character of the work of our State Association in its scientific meetings, but on the other hand it seems to me that we must remember we have a certain educational duty to perform to the professional men of the state. I can illustrate my point no better than to give an instance in our medical session of yesterday. It was the paper of Dr. H. W. Christianson of Wykoff, "Thrombo-Angeitis Obliterans with Case Report." That is a very rare condition. I have never seen a case and recognized it, but he had seen this very interesting case and made a fine report of it. As far as I know, Dr. Christianson does not belong to any special scientific societies; he is a general practitioner. This is the only place general practitioners of the state have to bring something of real scientific interest to the attention of the profession and we must not forget that there must be interspersed throughout our programs considerable scientific work. A great deal of it is research that we as practical men may not be interested in and yet it seems to me that it is the duty of our organization to stimulate that sort of investigation and research. We should also report and put on record all these very important case reports.

It strikes me that we should consider the matter very carefully before altering our present plan of having the rather large number of papers read and discussed at our meetings.

The thing that occurred to me yesterday during our medical session was that the papers were too long drawn out. If the papers could be epitomized and the real meat of the thing boiled down and if less time were allotted to each man to present his paper, a great deal of time would be saved. It would also enable a larger number of men to participate.

It is a very good sign when we have a great many more men who want to present papers than we have place on the program for. I remember some years ago, as Chairman of the Medical Section, I had a very hard time getting enough papers from men that I knew were in a position to speak with some authority. If there are more men wanting to read papers than we have room on the program for, I say, let us encourage it.

DR. W. A. COVENTRY: It seems to me if we adopt the suggestion made by Dr. Litzenberg we will be going a step backwards. Practically every progressive society in the country has adopted this kind of a program. Some have gone even further.

There are two fundamental sections, medical and surgical, and that division has worked out the best in other state societies also.

It is my opinion that this year's program does not deserve much criticism. In fact, I am very proud of it and I think it is one of the best programs this society ever had. It

strikes me that it would be a mistake to change the present system.

Furthermore, having had some experience in a secretarial position, I think it is a good sign so many doctors wish to read papers and their wishes should be followed in this matter. If you cut down the number of sections they will certainly not be given an opportunity to read their papers.

DR. F. W. METCALF: I am a general practitioner. I do some surgery—I have to do it. I also do some obstetrics and some general medicine and I want to say I am going to relieve Dr. Litzenberg of mentioning what is on his mind. There was a paper by Dr. M. C. Bergheim of Hawley which was read and discussed in the surgical section which will be of wonderful help to every practitioner who heard him. At the same time there was work being presented in the medical section which I would like to have heard. I think both those who want one section and those who want two sections could get together on this in a very simple manner by having a general session in which subjects of general interest would be discussed and then have it divided into two sections where special topics could be taken up.

THE SECRETARY: We have two general meetings and sectional meetings besides.

DR. L. HARRIMAN: I cannot help but endorse the viewpoint of Dr. Litzenberg. I am in general practice myself, outside of the city, and as I was driving in this morning I thought if we had only one section it would be a great deal better. We are like small boys who go to a three-ring circus and try to see it all and so don't see anything.

DR. H. Z. GIFFIN: I am very much in favor of encouraging the men to present their papers in abstract. I think there has not been a paper given so far that could not have been reduced to at least two-thirds of the time. I would like to suggest that the time allotted to individual papers be reduced.

THE PRESIDENT: That is largely under the control of the Chairman of the Section although twenty minutes is the time allowed by the by-laws.

I have gone to the meetings of the different state societies year after year and I am more and more impressed with the fact that from a scientific standpoint no society is better than ours, in fact, most of them are not nearly so good. I should be very much opposed to changing anything now, as this society is big enough for two sections.

DR. LITZENBERG: Mr. President, I think what most of us want is to get more sessions for the general practitioner and perhaps that can be arrived at in a less radical manner. I think we all want about the same thing—less division.

DR. GEO. D. HEAD: It has always seemed to me that the President's address should be given at the dinner and not at an early hour to oftentimes a small group, such as we had this year. Very few men got out to hear it and when a President goes to the trouble to prepare an address it should be heard by the profession of the state.

DR. W. A. JONES: I believe that the Program Committee is responsible for things along this line and why should we interfere?

DR. GEO. D. HEAD: The trouble is that the Program Committee is not going to make any changes without authority or without some word from this House. I think we should have a special committee appointed to take up this matter.

THE PRESIDENT: The Program Committee is not a regular committee, but merely a group of men who meet two or three times a year and who act as a committee. However, I am sure they would be very glad to have suggestions from you.

It was moved that this matter be referred to a committee. Seconded and carried.

THE PRESIDENT: Is there any further new business?

DR. H. M. WORKMAN: I have a resolution here which was presented to the Council and the Council is referring it to the House of Delegates.

[The resolution submitted concerned claims on the part of the *Journal-Lancet* of being the journal of the Minnesota Medical Association. Considerable discussion took place. —Editor.]

DR. G. D. HEAD: In the interests of harmony in our association let us substitute this resolution for the one presented by the Council.

Resolved, that the House of Delegates in this session assembled request of the *Journal-Lancet* the discontinuance of any printing in any part of any future bound volume indicating that the *Journal-Lancet* in any way represents the State Medical Association.

It was moved that the resolution be adopted as stated. Seconded and carried.

THE PRESIDENT: Is there any other new business to come before the House of Delegates?

THE SECRETARY: As you know, the constitution does not provide for the appointment of committees by the incoming President, so each year a motion has to be made that the incoming President appoint the new committees for the ensuing year. I would like to make that motion.

Seconded and carried.

DR. W. L. BEEBE: Mr. Chairman, last year as a delegate I was instructed to invite this meeting to come to St. Cloud. I was pretty badly thrown into the air, so it took me quite a while to get back and this year without any authority I will take it upon myself to repeat that invitation from Stearns County. We would be very glad to have you meet at St. Cloud next year.

It was moved that Dr. Beebe's invitation be accepted. Seconded and carried.

THE PRESIDENT: I am sure we appreciate this invitation and I know we will have an enthusiastic meeting in St. Cloud.

The President appointed a committee consisting of Dr. W. L. Beebe and Dr. Geo. D. Head to conduct the President to the platform at the afternoon session.

DR. GEO. D. HEAD: I am very sorry, Mr. Chairman, but I will be unable to attend the meeting this afternoon.

THE PRESIDENT: That will be all right and I appoint Dr. M. H. Workman in your stead.

The Chair would like to have someone make a motion to the effect that the Secretary thank the members of the Ramsey County Medical Society and the Masonic bodies here for their many kindnesses and courtesies in making this a most enjoyable and satisfactory meeting.

Such a motion was made, seconded and carried.

As there was no further business to come before the meeting, on motion, duly seconded and carried, the House of Delegates adjourned *sine die*.

AUDIT REPORT OF MINNESOTA STATE MEDICAL ASSOCIATION, OCTOBER 12, 1922, TO OCTOBER 10, 1923

October 19, 1923.

Minnesota State Medical Association,
St. Paul, Minnesota.

Gentlemen:—

Pursuant to instructions received from your Executive Secretary, Mr. J. R. Bruce, we have made an audit of the books and records of the Minnesota State Medical Association for the period of October 12, 1922, to October 10, 1923, inclusive, and submit our report in the accompanying comments, and statements as follows:

EXHIBIT A—Statement of Cash Receipts and Disbursements.

EXHIBIT B—Balance Sheet as of October 10, 1923.

EXHIBIT C—Statement of operations of MINNESOTA MEDICINE—publication.

SCHEDULE 1—BANK RECONCILIATION

In the course of the audit we reconciled the bank balance, counted the securities in the possession of the Treasurer, and otherwise made such tests of the books and accounts as we deemed sufficient to satisfy ourselves of their correctness, and as a result of which,—

WE HEREBY CERTIFY, That in our opinion, the balance sheet, Exhibit B, presents the true financial condition of the Association and the Statement of Receipts and Disbursements, Exhibit A reflects the operations of the Association for the period under review, October 12, 1922, to October 10, 1923.

Respectfully submitted,
ARNOLD, FLESHER & COMPANY,
By BENJ. H. FLESHER.

EXHIBIT A

MINNESOTA STATE MEDICAL ASSOCIATION STATEMENT OF CASH RECEIPTS AND DISBURSEMENTS FOR THE PERIOD OCTOBER 12, 1922, TO OCTOBER 10, 1923

RECEIPTS OF INCOME:		
Membership Dues	$ 9,515.00	
Membership Dues in Arrears	60.00	
Advertising	7,681.42	
Subscriptions	330.75	
Interest on Mortgages	189.00	
Interest on Bonds	160.00	
Interest on Bank Balances	93.70	
Total		$18,029.87
DISBURSEMENTS OF EXPENSES:		
Publication—MINNESOTA MEDICINE	$10,352.08	
Legal	2,683.71	
Salaries	1,450.00	
Convention (Minneapolis, 1922)	728.32	
Council	170.02	
Legislative Committee	465.97	
Publicity	15.25	
Sundries	595.21	
Total		16,460.56
NET INCOME		$1,569.31
OTHER DISBURSEMENTS:		
Purchase of Mortgage Bond—3 Yrs. 6 per cent		2,000.00
EXCESS OF DISBURSEMENTS OVER RECEIPTS FOR THE PERIOD		$430.69
BALANCE, October 12, 1922		3,903.44
BALANCE, October 10, 1923—On Deposit with the Minnesota Transfer State Bank		$3,472.75

EXHIBIT B

MINNESOTA STATE MEDICAL ASSOCIATION BALANCE SHEET, OCTOBER 10, 1923

ASSETS		
Cash in Bank	$3,472.75	
Accounts Receivable	1,861.52	
Northern Pacific Bonds	4,000.00	
First Mortgage Bonds	4,700.00	
Furniture and Fixtures	286.00	
Total Assets		$14,329.27
LIABILITIES		
None	0	0
NET WORTH		$14,320.27

EXHIBIT C

MINNESOTA STATE MEDICAL ASSOCIATION STATEMENT OF OPERATIONS OF MINNESOTA MEDICINE PUBLICATION, OCTOBER 12, 1922. TO OCTOBER 10, 1923

REVENUE:		
Advertising	$7,681.42	
Subscriptions	330.75	
Membership Subscription Allowance—1,893 Members at $2 each	3,786.00	
Members in Arrears—27 at $2 each	54.00	
*Accounts Receivable—Advertising October 10, 1923	1,861.52	
Total		$13,713.69
EXPENSES:		
Printing	$4,136.00	
Paper Stock	1,271.55	
Editorial	2,228.52	
Advertising Commission (Bruce Pub. Co.)	1,682.44	
Postage	311.00	
Envelopes	142.67	
Stenographic Service	535.00	
Miscellaneous	44.90	
*Accounts Receivable—Advertising October 12, 1922	1,920.69	
Total		12,272.77
Net gain for the period October 12, 1922, to October 10, 1923		$1,440.92

* NOTE—Advertising is not considered as income on the books until received in cash. In this statement it is the desire to take into account unearned advertising, and as a result the amount of uncollected advertising is shown as indicated.

SCHEDULE B-1

MINNESOTA STATE MEDICAL ASSOCIATION BANK RECONCILIATION SEPTEMBER 30, 1923

Cash Balance per Books		$3,472.75
Plus Outstanding Checks:		
No. 334	$30.00	
No. 335	164.27	
No. 336	673.68	
No. 337	100.00	
No. 338	1.00	
No. 339	7.45	
No. 340	11.95	
No. 341	4.00	
		992.35
		$4,465.10
Less deposits made in October:		
Northern Pacific Bond Coupons	$160.00	
Bruce Pub. Co. Com. Refund	36.69	
Advertising Receipts	80.56	
Membership Dues	25.00	
		302.25
Cash Balance per Bank Statement		$4,162.85

COMMENTS

EXHIBIT A—The statement of cash receipts and disbursements is designed to show the results of the operation of the association for the period October 12, 1922, to October 10, 1923, on a cash basis. This would indicate that all the income for the period was collected and all the expenses were paid.

It will be noted that the association shows a net profit of $1,569.31 for the period, and that this sum together with another sum of $430.69, was invested in a 6 per cent First Mortgage Bond of $2,000.00, maturing in three years. After making this investment there remained a balance of $3,472.75, to the credit of the association, in the Minnesota Transfer State Bank.

In explanation of some of the items appearing in the statement of receipts and disbursements, we would call your attention to the following:

Convention $728.32—This is the amount spent in holding the 1922 convention in Minneapolis.

Legislative Committee: $465.97—This is the amount spent by the committee for stationery, postage, multigraphing, etc.

Council: $170.02—This amount was expended in connection with the trip of Dr. Workman in attending the Minneapolis Council meeting and stationery.

Sundries: $595.31—This item consists of expenditures for wages, stationery, postage, insurance, and sundry office expense.

EXHIBIT B—BALANCE SHEET. This is a detailed statement of the Assets and Liabilities of the association, at October 10, 1923. This statement was prepared from information and data furnished, as no ledger accounts were kept. The profit shown in Exhibit A cannot be reconciled with the amounts shown in this statement as a result of the absence of ledger accounts.

EXHIBIT C—This statement purports to show the operating results in connection with the publishing of MINNESOTA MEDICINE. While no special records are maintained to show actual income and expense of the publication, it is, nevertheless, possible to secure the information from the books of the association.

It might be well to explain that the members of the association do not directly subscribe to the magazine, but pay for it indirectly through the dues. Therefore, to ascertain the revenue which the publication would be entitled to, the membership is arbitrarily assessed $2.00 each. In this statement the subscription revenue is computed on a basis of 1,893 members in good standing and 27 members in arrears. It will be noted that by giving the publication its allotment of $2.00 per member, its operations show a net profit of $1,440.92, for the period under review.

In conclusion, we would state that although no ledger accounts were maintained, the records employed by the association were found to be in good condition, and no discrepancies were found.

In accordance with the instructions of the secretary, we installed a double entry system of bookkeeping which, if maintained properly, will at all times show the correct operations of the association.

THE MINNESOTA STATE MEDICAL ASSOCIATION
1923
MINUTES OF THE GENERAL SESSION

The general session was called to order at the Masonic Temple, St. Paul, October 11, 1923, at 8:10 o'clock A. M., by President E. Starr Judd, M.D., Rochester, Minnesota, who thereupon read the Presidential Address.

Dr. F. J. Savage then read a paper on "Why Has the Medical Profession Lost the Position It Once Held in the Esteem of the Public?" It was discussed by Dr. Strickler, Dr. Olin West, Secretary of the A. M. A., Dr. J. T. Christison, St. Paul, the discussion being closed by the essayist.

Senator J. D. Denegre, St. Paul, then spoke on the subject: "Association and Fair Play"; after which the general session adjourned.

MINUTES OF THE MEDICAL SECTION

Chairman, Dr. H. Z. Giffin, Rochester; Secretary, Dr. A. C. Baker, Fergus Falls.

FIRST DAY—THURSDAY, OCTOBER 11th

The first session of the Medical Section of the Fifty-fifth Annual Meeting of the Minnesota State Medical Association was called to order in the Masonic Temple, St. Paul, at 10:10 A. M. by the Chairman.

Dr. H. M. Conner, Rochester, read a paper on "Differential Diagnosis of Conditions Associated with Splenomegaly," which was discussed by Dr. Edward L. Tuohy, Duluth; Dr. J. P. Schneider, Minneapolis; Dr. H. T. Helmholz, Rochester, and the Chairman.

Dr. C. Eugene Riggs, St. Paul, presented a paper on "Preliminary Note—A Study of the Nervous Syndrome and the Blood Serum in Pernicious Anemia as an Aid in Diagnosis Before Recognizable Changes Are Apparent." Discussion by Dr. Gilbert Kvitrud, St. Paul; Dr. C. R. Ball, St. Paul; Dr. Henry Woltman, Rochester; Dr. H. M. Conner, the essayist, and the discussion was closed by Dr. Kvitrud.

Under the general head of "Symposium on Non-pulmonary Tuberculosis," the following papers were read: "Cutaneous Manifestations of Tuberculosis," by Dr. John H. Stokes, Rochester; "Tuberculosis of the Bones and Joints," by Dr. Carl C. Chatterton, St. Paul; "Genito-Urinary Tuberculosis," by Dr. Herman C. Bumpus, Rochester; "Gastro-Intestinal Manifestations of Tuberculosis," by Dr. Walter J. Marcley, Minneapolis; and "Heliotherapy in the Treatment of Tuberculosis," by Dr. J. Harry Bendes, Oak Terrace. Discussion was opened by Dr. W. S. Lemon, Rochester, and continued by Dr. E. Mariette, Minneapolis; Dr. Miron, Dr. H. T. Helmholz, Rochester; Dr. J. A. Myers, Minneapolis.

Dr. George B. Eusterman, Rochester, read a paper on "Relation of Recurrent or Secondary Peptic Ulcers to Focal Infection." Discussion by Dr. Robert L. Rizer, Minneapolis, Dr. O. C. Strickler, New Ulm, and the discussion was closed by the essayist.

Dr. F. J. Hirschboeck, Duluth, read a paper on "Massive Collapse of the Lung." Discussion by Dr. George E. Fahr, Minneapolis; Dr. George D. Head, Minneapolis; Dr. Edward L. Tuohy, Duluth, closed by the essayist.

Dr. John M. Lajoie presented a paper on "Bronchial Asthma," which was discussed by Dr. C. B. Wright, Minneapolis; Dr. C. N. Hensel, St. Paul, and closed by the essayist.

Dr. H. W. Christianson read a paper on "Thrombo-Angeitis Obliterans with Case Report." Discussed by Dr. J. F. Corbett, Minneapolis; Dr. Emil S. Geist, Minneapolis; Dr. Edward Evans, La Crosse, Wis.; Dr. S. H. Boyer, Duluth, and Dr. H. L. Ulrich, Minneapolis, discussion being closed by the essayist.

Dr. F. A. Willius, Rochester, then read a paper on "Syphilitic Aortitis." Discussion by Dr. John H. Stokes, Rochester; Dr. H. L. Ulrich, Minneapolis; Dr. Edward L. Tuohy, Duluth; Dr. C. N. Hensel, St. Paul, and Dr. S. M. White, Minneapolis, and closed by the essayist.

Under the "Symposium of Diabetes and Insulin," the following papers were read: "The Treatment of Simple Cases of Diabetes," by Dr. A. H. Beard, Minneapolis; "Present Indications for the Use of Insulin," by Dr. Edward

L. Tuohy, Duluth; "Hypoglycemia," by Dr. J. B. Collip, Edmonton, Alberta; "The Treatment of Emergencies in Diabetes," by Dr. R. M. Wilder, Rochester. Discussion was opened by Dr. S. Marx White, Minneapolis, and closed by Dr. J. B. Collip, Edmonton, Alberta.

MINUTES OF THE SURGICAL SECTION

Chairman, Dr. H. B. Zimmerman, St. Paul; Secretary, Dr. Gilbert J. Thomas, Minneapolis.

FIRST DAY—OCTOBER 11th

The first session of the Surgical Section was held in the Masonic Temple, St. Paul, and was called to order at 9:20 A. M. by the Chairman.

In a "Symposium on Diseases of the Gallbladder," Dr. J. P. Schneider, Minneapolis, read a paper entitled "Differential Diagnosis"; Dr. Frank Bissell, Minneapolis, read a paper on "Roentgenological Diagnosis"; Dr. Harry P. Ritchie, St. Paul, on "Surgical Diagnosis"; Dr. Arnold Schwyzer, St. Paul, on "Surgical Treatment."

These papers were then discussed by Dr. Evarts A. Graham, St. Louis; Drs. F. Starr Judd, Rochester; Arthur T. Mann, Minneapolis; Edward Evans, La Crosse, Wis.; Theo. Bratrud, Warren; A. MacLaren, St. Paul; R. E. Farr, Minneapolis; and in closing by the essayists.

The second session of the Surgical Section was held in the Masonic Temple, St. Paul, and was called to order at 2 P. M. by the Chairman.

Dr. F. G. Watson read a paper entitled "Report of a Case of Rupture of the Kidney," which was discussed by Drs. Gilbert J. Thomas, Minneapolis; A. C. McGee, Deer River; R. E. Farr, Minneapolis; F. W. Metcalf, Fulda; and H. L. Parker, Rochester.

Dr. A. W. Adson, Rochester, read a paper on "The Surgical Treatment and Results of Spinal Cord Tumors," which was discussed by Drs. J. Frank Corbett, Minneapolis; R. E. Farr, Minneapolis, and in closing by Dr. Adson.

Dr. W. A. Fansler, Minneapolis, read a paper on "The Rectum as a Factor in Chronic Focal Infections," which was discussed by Dr. L. A. Buie, Rochester.

Dr. T. W. Weum, Minneapolis, read a paper entitled "Extra-Uterine Pregnancy," which was discussed by Drs. F. L. Adair, Minneapolis; L. W. Barry, St. Paul; W. A. Coventry, Duluth; V. J. Hawkins, St. Paul, and in closing by the essayist.

Dr. H. I. Lillie, Rochester, followed with a paper entitled "The Ear in General Medical Diagnosis," which was discussed by Drs. Horace Newhart, Minneapolis; and Charles N. Spratt, Minneapolis.

Dr. Gordon B. New, Rochester, read a paper entitled "Actinomycosis of the Head and Neck," which was discussed by Drs. Edward Evans, La Crosse, Wis.; A. H. Sanford, Rochester, and in closing by the essayist.

Dr. W. A. Coventry, Duluth, followed with a paper entitled "Metastasis from Breast Cancer," which was discussed by Dr. James A. Johnson, Minneapolis; W. E. Sistrunk, Rochester; C. A. Donaldson, Minneapolis, and in closing by the essayist.

Dr. F. J. Pratt, Minneapolis, followed with a paper entitled "Apparent Deformity of the Pillars of the Fauces After Tonsillectomy," which was discussed by Drs. Wm. R. Murray, Minneapolis; Carl Larsen, St. Paul, and again by Dr. Pratt.

Adjourned.

ANNUAL BANQUET

The banquet was held in the Palm Room of the Saint Paul Hotel at 6:30 P. M., October 11, 1923. Dr. Arthur Sweeney, St. Paul, officiated as toastmaster, and after the musical program the toastmaster introduced the following gentlemen, who spoke upon various subjects: Dr. J. B. Collip, University of Alberta, Edmonton, Alberta; Dr. Evarts A. Graham, Washington University School of Medicine, St. Louis, Mo.; Dr. Olin West, Secretary of the American Medical Association, Chicago, Ill.; Dr. Clemens Freiherr Pirquet of the University of Minnesota, and Dr. Charles H. Mayo, Rochester.

MINUTES OF THE MEDICAL SECTION

Chairman, Dr. H. Z. Giffin, Rochester; Secretary, Dr. A. C. Baker, Fergus Falls.

SECOND DAY—FRIDAY, OCTOBER 12th

The second session of the Medical Section of the Fifty-fifth Annual Meeting of the Minnesota State Medical Association was called to order in the Masonic Temple, St. Paul, at 8:10 A. M., by the Chairman.

Dr. T. L. Birnberg read a paper on "Concentrated Food in Infant Feeding." Discussion by Dr. Clemens Pirquet, Dr. J. T. Christison, St. Paul, closed by essayist.

Dr. H. T. Helmholz, Rochester, read a paper on "The Diagnosis of Acute Appendicitis in Children." Discussion by Dr. F. C. Rodda, Minneapolis; Dr. E. S. Judd, Rochester; Dr. Roy Andrews, Mankato; Dr. T. L. Birnberg, St. Paul; Dr. H. Z. Giffin, Dr. R. C. Logefield, Minneapolis, closed by the essayist.

Dr. F. L. Adair, Minneapolis, presented a paper on "Hypertension in Pregnancy." Discussion by Dr. E. L. Gardner, Dr. A. G. Schulze, St. Paul; Dr. Archibald McDonald, Duluth; Dr. F. J. Hirschboeck, Duluth; Dr. J. C. Litzenberg, Minneapolis, closed by the essayist.

Dr. Hilding C. Anderson, Duluth, gave an address on "Experimental Renal Insufficiency and Hypertension." Discussion by Dr. E. T. Bell, Minneapolis; Dr. S. H. Boyer, Duluth, and Dr. G. E. Fahr, Minneapolis.

Dr. Leo G. Rigler read a paper on "Chronic Nephrosis" by Drs. Leo C. Rigler and Harold Rypins, Minneapolis. Discussion by Dr. M. H. Nathanson, Minneapolis, and Dr. Edward L. Tuohy, Duluth.

Dr. J. L. Crewe, Rochester, read a paper on "Rest and Diet in the Treatment of Cardio-Vascular Disease." Discussion by Dr. John H. Moore, Grand Forks, N. D., closed by essayist.

Dr. Frank Whitmore read a paper on "Congenital Syphilis of the Nervous System with a Report of Juvenile Tabes in Twins." Discussed by Dr. J. C. McKinley, Minneapolis; Dr. E. D. Anderson, Minneapolis; Dr. O. W. Parker, Ely; Dr. Paul Berrisford, St. Paul; discussion closed by the essayist.

Dr. Edward J. Engberg read a paper on "Psycho-Neurosis." Discussion by Dr. A. S. Hamilton, Minneapolis; Dr. H. Woltman, Rochester, and closed by the essayist.

Dr. E. M. Hammes' paper on "Epidemic Encephalitis" was then read.

SURGICAL SECTION

SECOND DAY—FRIDAY MORNING, OCTOBER 12th

The third session of the Surgical Section was held in the Masonic Temple, St. Paul, and was called to order at 8:20 A. M. by the Chairman.

Dr. Paul Berrisford, St. Paul, read a paper entitled

"Headaches from the Standpoint of the Ophthalmologist," which was discussed by Drs. John Fulton, St. Paul; Homer Collins, Duluth, and in closing by the essayist.

Dr. M. C. Bergheim, Hawley, read a paper on "Obstetrics and the Country Practitioner," which was discussed by Drs. J. C. Litzenberg, Minneapolis; W. E. Richardson, Pipestone; W. A. Coventry, Duluth, and again by Dr. Bergheim.

Dr. Donald C. Balfour, Rochester, followed with a paper entitled "Factors of Safety in Gastric Surgery," which was discussed by Drs. A. C. Strachauer, Minneapolis; Arnold Schwyzer, St. Paul; William Mayo, Rochester; Theo. Bratrud, Warren; and in closing by the essayist.

Dr. Frederick E. B. Foley, St. Paul, read a paper on "Diagnosis of Anomalous Renal Artery as a Cause of Upper Urinary Tract Stasis," which was discussed by Drs. Gilbert J. Thomas, Minneapolis; Wm. F. Braasch, Rochester; William Mayo, Rochester; A. C. Strachauer, Minneapolis; Arnold Schwyzer, St. Paul; and in closing by the essayist.

In a "Symposium on Fractures of the Femur," Dr. Wallace Cole, St. Paul, read a paper entitled "Anatomy and Mechanics of Fractures of the Femur"; Dr. H. W. Meyerding, Rochester, read a paper on "Non-Operative Treatment"; Dr. Charles A. Reed, Minneapolis, on "Operative Treatment," and Dr. Alex Colvin, St. Paul, a "Clinic." These papers were discussed by Drs. A. E. Wilcox, Minneapolis; E. K. Green, Minneapolis; W. E. Richardson, Pipestone; R. O. Earl, St. Paul; A. E. Benjamin, Minneapolis; Arnold Schwyzer, St. Paul; H. B. Zimmerman, St. Paul. The discussion was closed by the essayist.

Adjourned.

GENERAL SESSION

The general meeting was held in the Masonic Temple at 2 P. M., October 12th, and presided over by President Judd. After the meeting was called to order Dr. Judd appointed Dr. Workman and Dr. Beebe to escort the newly elected President to the platform.

THE PRESIDENT (Dr. Archibald MacLaren): Gentlemen of the State Association: I have always been very proud to be a member of the Minnesota State Medical Association and the finer standard of men and women making up its membership having increased from year to year in my experience makes me doubly proud to have this honor which you have conferred upon me, and I thank you very much.

DR. JUDD: The next order of business is the report of the House of Delegates.

THE SECRETARY: Mr. President, the House of Delegates met on Wednesday afternoon and again this morning. At the meeting this morning the following officers were elected: Dr. Archibald MacLaren, St. Paul, President for 1924; Dr. E. T. Sanderson, Minneota, First Vice President; Dr. F. J. Hirschboeck, Duluth, Second Vice President; Dr. C. W. Bray, Biwabik, Third Vice President. The Treasurer, Dr. F. L. Beckley, was re-elected and the present Secretary was also re-elected. Dr. Braasch and Dr. Weiser were also re-elected councilors for their respective districts.

Of the total membership of the Association this year, 1,884, there was a registration of 517 up to this noon, which is some one hundred better than last year. This total membership in the Association is 78 more than a year ago. The Treasurer reports an increase in the assets of the Association of about $1,500. The House of Delegates decided to hold in the future their second meeting on the second day instead of the third day. A special committee was appointed by the House of Delegates to consider the question of programs, that is, to consider the advisability of having just one section instead of two, or having more of the combined meetings, and also report on the advisability of dividing the surgical section into more than one section.

DR. JUDD: Because of the long scientific program this afternoon it seemed best to the officers to divide this program into two parts, have part of it in this room and part in the room that has been used by the Medical Section. So we have divided it. Dr. Woltmann's paper and the symposium on metabolism will be given in the room that has been used by the Medical Section, the other papers in this room.

MINUTES OF THE MEDICAL SECTION

Chairman, Dr. H. Z. Giffin, Rochester; Secretary, Dr. A. C. Baker, Fergus Falls.

AFTERNOON SESSION—FRIDAY, OCTOBER 12th

Dr. H. W. Woltmann read a paper on "Consideration of Some Neurologic Disorders Associated with Pain and General Diagnosis." Discussion by Dr. A. S. Hamilton, Minneapolis, and Dr. L. A. Nippert, Minneapolis.

Under the title of "Symposium on Metabolism," the following papers were read: "The Factors in Health and Disease That Affect the Metabolic Rate," by Dr. Max H. Hoffman, St. Paul; "The Value of the Basal Metabolic Rate in Surgical Practice," by Dr. T. L. Chapman, Duluth; "The Value of the Basal Metabolic Rate in General Medical Practice," by Dr. A. E. Mark; "The Significance of the Total and the Basal Metabolism in Exophthalmic Goiter," by Dr. Walter M. Boothby, Rochester. Discussion was opened by Dr. H. S. Plummer, Rochester, and continued by Dr. Walter M. Boothby.

Adjourned.

SURGICAL SECTION

SECOND DAY—FRIDAY AFTERNOON, OCTOBER 12th

The last session of the Surgical Section was called to order at 2:40 P. M. by the Chairman, following the short general session.

Dr. H. L. Parker, Rochester, read a paper entitled "The Clinical Significance of Pain in the Area Supplied by the Fifth Cranial Nerve." This paper was discussed by Drs. Angus W. Morrison, Minneapolis; E. E. McGibbon, Minneapolis; T. B. Hartzell, Minneapolis, and Arnold Schwyzer, St. Paul; after which the discussion was closed by the essayist.

Dr. E. Mariette, Minneapolis, read a paper entitled "Medical Considerations of Extra-Pleural Thoracoplasty."

Dr. A. A. Law, Minneapolis, read a paper entitled "Surgical Considerations of Extra-Pleural Thoracoplasty."

These two papers were discused by Drs. J. A. Myers, Minneapolis; Harry P. Ritchie, St. Paul; Arnold Schwyzer, St. Paul, and in closing by the essayists.

Dr. Horace Newhart, Minneapolis, read a paper on "Problems in Relation to the Hard of Hearing," which was discussed by Drs. Carl Larsen, St. Paul, and T. B. Hartzell, Minneapolis.

Dr. Ruth Boynton, Minneapolis, read a paper entitled "Report on the Midwife Situation in Minnesota," which was discussed by Drs. F. L. Adair, Minneapolis; J. C. Litzenberg, Minneapolis; Olga Hansen, Minneapolis, and E. A. Zaworski, Minneapolis. Adjournment.